Virginia Department of Medical Assistance Services

Healthy Returns[SM] Care Management Program

2006 Annual Report

Prepared October 2007

This report is a draft only. The information contained in the report, including the clinical outcomes, claims utilization, and expense/financial figures, have not been verified.

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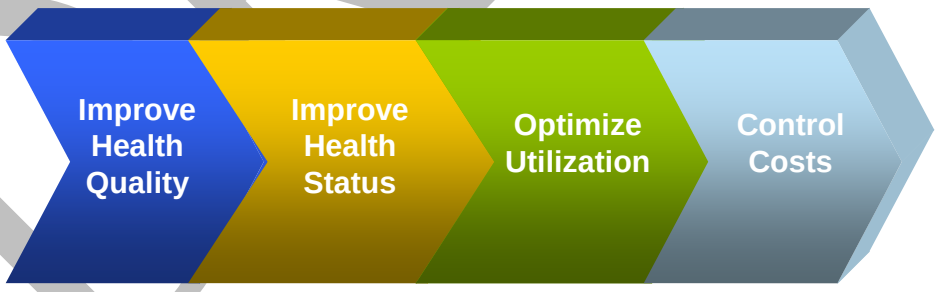
Introduction

In 2004, Virginia Department of Medical Assistance Services (DMAS) contracted with HMC to offer a pilot disease management program for a subset of eligible DMAS members identified with coronary artery disease or heart failure. After 12 months of program management, clinical and financial outcomes were reported to DMAS. Following the positive results of the cardiac pilot, DMAS expanded the pilot program in January 2006 to include disease management services for pediatric and adult members identified with asthma and diabetes.

The following report is a summary of health outcomes for DMAS members managed as part of the Healthy Returns℠ Care Management Program. Outcomes for the DMAS fee for service population identifiable for the four chronic conditions during 2006 are compared with Medicaid adult and pediatric members covered under DMAS fee for service plans in 2005. Please note that some members originally managed as part of the cardiac pilot continue to receive management under the expanded program and therefore this report cannot represent a true pre-program/post-intervention evaluation. Unless otherwise noted, analyses are for all groups except DMAS Home and Community Based Waivers. Please refer to the Methodology in the Appendix for additional details on the evaluation.

The program fosters improved health of its managed members by better coordinating physician services and patient self-care, emphasizing increased adherence to behaviors associated with optimal health and pharmacy guidelines. Specifically, the program strives to:

- Improve health quality outcomes
  - Reflected in people having the right tests performed in compliance with recommended guidelines
- Improve health status outcomes
  - Reflected in people having improved clinical test levels and fewer days of lost activity
- Optimize utilization
  - Improvement in health outcomes optimizes utilization of medical services – use of preventive services drives reductions in the use of expensive medical services, such as inpatient admissions and emergency room visits
- Control healthcare costs
  - Control costs due to improved process, status and utilization outcomes



To support these goals the program focuses on:

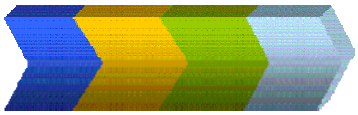
- Identification of members with diabetes
- Assignment to appropriate care management levels based on the member's health risk score
- Enrollment of members into the program
- Clinical assessment to identify health improvement goals
- Member-focused clinical interventions that integrate all aspects of member healthcare

This report includes a review of clinical and financial outcomes for members identified with a condition of asthma, diabetes, coronary artery disease or heart failure through December 31, 2006. The evaluation periods for the report are:

- January 1, 2005 through December 31, 2005 (2005)

- January 1, 2006 through December 31, 2006 (2006)

Executive Summary



The program has made a positive impact on clinical and financial outcomes for the DMAS population as shown by improvements in health quality and health status outcomes. Utilization and expense related to conditions managed by the program declined or were stabilized in 2006 compared to 2005. In addition to improved outcomes, claims utilization patterns, particularly in the inpatient and emergency setting, declined, resulting in incremental savings of $9.34 for each dollar invested in the program. Given the various comorbid conditions, along with the socioeconomic barriers affecting this complex population, the program made significant progress in moving DMAS members toward improved health.

In 2006, there were a total of 23,033 members identified for program management:

- 52% were adults, with an average age of 26.
- 69% of all identified cases continue to be managed as of September 2007.
- The average number of months of eligibility with DMAS in 2006 is seven.
- 43% of identified members are disabled and 48% are classified as families receiving general assistance.

Clinical / Health Quality Improvements

Health quality improvements were achieved among members through regular testing and taking medications as prescribed. The improved quality is significant and indicates members are making improvements in the self-management of their condition. The following highlights the clinical outcomes for members:

- 56% of members with asthma received a flu vaccine and 97% follow an asthma action plan.
- 68% of members with diabetes perform blood glucose monitoring, up from 58% and above the Book of Business (BOB) rate.
- Improved testing rates for dilated retinal exams and microalbumin tests. This is important for members with diabetes so that development of complications related to diabetes may be regularly monitored.
- Rate of prescriptions for medications specific to asthma management increased.
- Prescription rates for beta blockers and ACE inhibitors increased or were maintained among members with CAD and HF. This is a notable since statins are considered necessary for the maintenance of cardiac conditions.
- LDL testing rates declined across conditions. Due to the age demographics (69% under 21) of the group, the metric is prone to fluctuations because many are not having the tests completed. In addition, it is believe that because of the group's age demographics many physicians are not requiring the tests to be completed. Nurse Consultants were notified of this finding and an IVR campaign is planned to proactively address this clinical metric going forward.

Health Status Improvements

Health status improvements were realized among members through increased vaccinations, healthy blood pressure levels and improved physical functioning. Among members with at least two nurse assessments and reporting results:

- There were significant increases in the number of members receiving flu vaccines.
- Lower A1C, blood pressure and LDL values were reported at reassessment
    - 88% of members with CAD reported controlled blood pressure and 69% achieved a LDL value of < 100.
    - 42% of members with diabetes report A1C values of 7 or less, up from 32%, and 80% report LDL values of 130 or less. These results are very positive since improvements in these areas are critical to proper management of diabetes and cardiac conditions.

- Marked improvement in mental and physical functioning, as measured by the SF-8® Health Survey; 53% of assessed members improved mental functioning and 77% improved physical functioning. This is especially positive given the percentage of disabled persons in this population.
- A significant decline (15%) in the average number of days of lost activity, from 11.3 to 9.6 days, driven by a 27% decline in members with asthma indicating increased productivity and improved health.

Utilization of Services Optimized

The program seeks to optimize utilization by reducing expensive exacerbations of care while encouraging drug regimen adherence and preventive care. Please note utilization results are trended and statistical outliers have been removed.

- Consistent with program goals, inpatient days per 1,000 members were down by 7%. These favorable declines were driven by decreases in utilization for members with asthma and pneumonia. For condition-specific inpatient measures, program goals were also achieved with a 28% decline in days per 1,000 members and a 20% decrease in inpatient admissions.
- Total emergency room visits were down 9% and condition-specific emergency room visits were reduced by 15%. The decline of ER utilization for condition-specific claims was driven by a decline in emergency room visits related to asthma and diabetes. This is extremely positive considering that half of identified members are minors with asthma.
- Outpatient facility utilization declined 7% and outpatient professional utilization was basically unchanged. Outpatient visits typically correlate to testing rates and indicate members are more knowledgeable of their condition and seek to have routine and preventive care treatments performed in the outpatient or office settings.
- Overall pharmacy utilization decreased 15% for all claims and for condition-specific claims. With management and education, it is expected that medication use would increase among members with chronic diseases. With Medicaid populations, HMC has found that the rate of prescriptions may decline as members are educated about proper use and dosage of recommended therapies.

Costs Controlled

As members with chronic conditions improve their health status and adherence to guidelines, costs may be more effectively controlled. All analyses are based on paid claims and unless otherwise noted exclude DMAS Home and Community Based Waivers.

- Following the positive utilization outcomes, inpatient expense declined 18% from 2005 to 2006. The primary drivers were reductions in the expense to treat members with heart disease and asthma, which decreased by 30% and 33%, respectively.
- There was a 23% decrease in ER expense, driven by reduced costs related to the treatment of members with asthma as well as a decline in expense related to non-specific symptoms (aches and pains).
- Following the decline in the rate of filled prescriptions, pharmacy expense declined 14%.
- Changes in utilization patterns led to an overall decline in weighted expense from $942 PDMPM (per diagnosed member per month, trended for comparison to the current year) in 2005 to $814 in 2006, resulting in a net savings rate of 12%. This savings rate translates to an incremental savings of $9.34:$1.00 for the current year.

In summary, program health results indicate that the Healthy Returns Care Management Program is making strides in improving the health of DMAS members. Through the annual evaluation, HMC has identified positive outcomes and areas needing improvements. Nurse Care Mangers and additional staff clinicians will focus on areas for improvement

through phone contacts, mailings and education outreach. HMC looks forward to continued partnership with DMAS and is committed to ongoing evaluation of our program delivery and processes in order to provide high quality care management for DMAS members.

CLINICAL OUTCOMES

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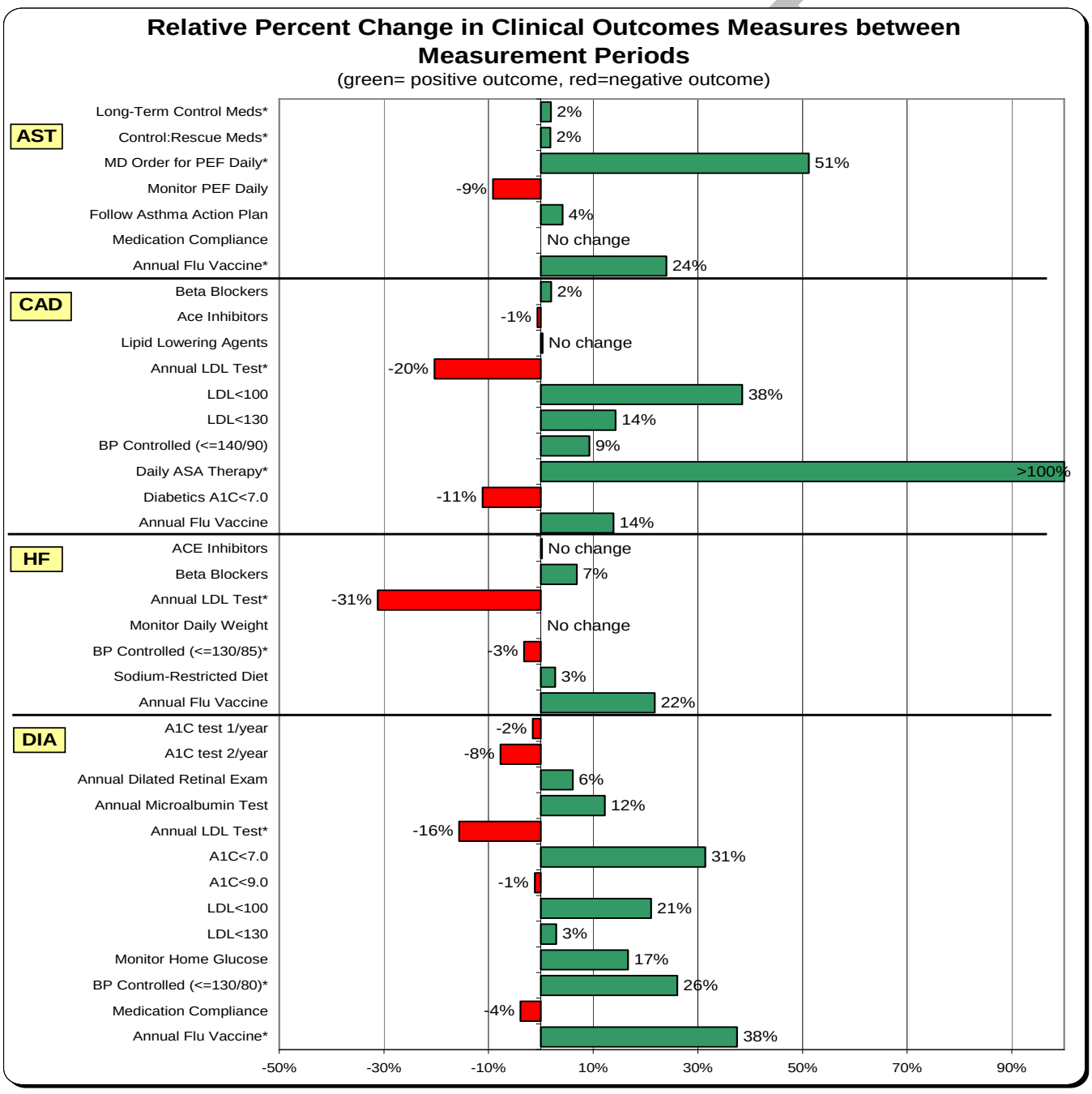
Clinical Outcomes Summary – Aggregate Population

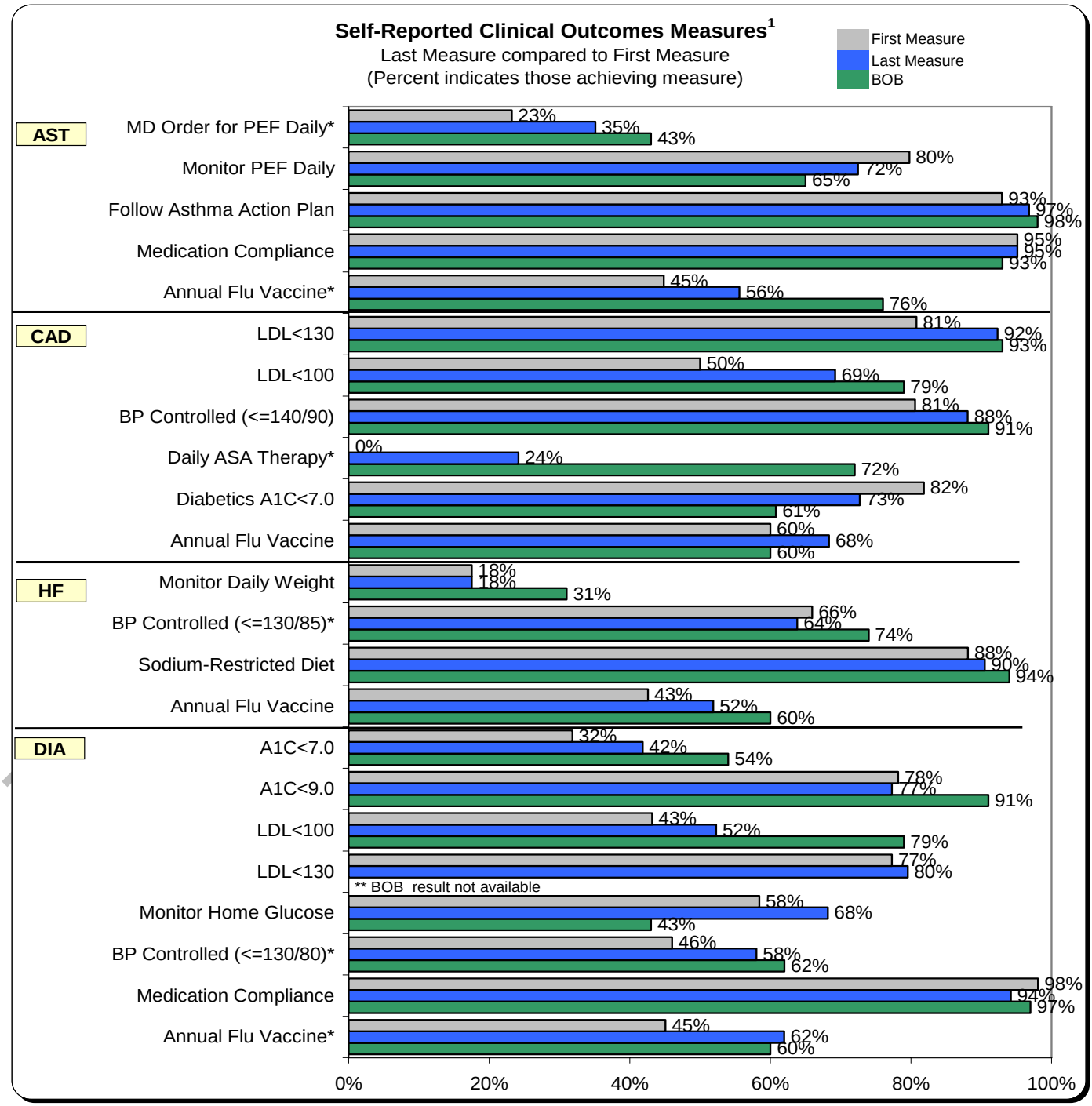
The health quality of members improves as self-care practices and preventive testing percentages increase. Clinical outcomes for DMAS members are improving. Claims-based outcomes are for all DMAS members, while self-reported outcomes are for managed high intensity members only. There were notable increases in the outcomes related to self-care practices across all conditions. Along with noted progress, areas for improvement were identified. Relative percent changes that were statistically significant are indicated with an asterisk.



*The difference between the first and last measures for self-reported data or between 2005 and 2006 for claims-based data is considered statistically significant at the 0.05 level using a two-tailed paired test.

Clinical Outcomes Measures – Aggregate Population

DMAS high intensity members experienced notable improvements in self-reported health outcomes across conditions. All self-reported outcomes are for high intensity members with both a first and last assessment. Relative percent changes that were statistically significant are indicated with an asterisk.



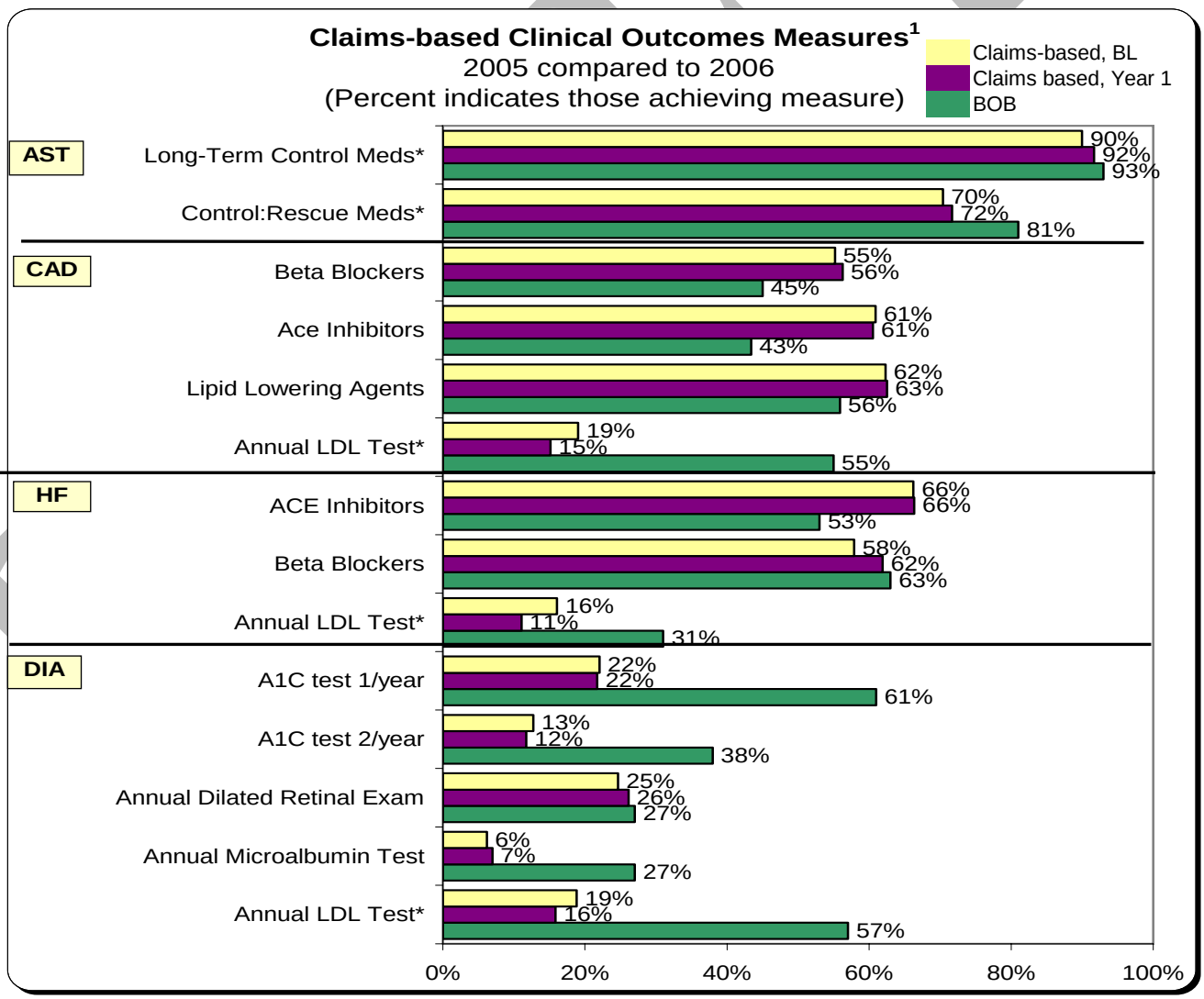
[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure.

- The difference between the first and last measures for self-reported data is considered statistically significant at the 0.05 level using a two-tailed paired test.

For those high intensity members with a reassessment, positive self-reported changes include:

- 56% of members with asthma received a flu vaccine and 97% follow an asthma action plan. Both are positive indications of self-management.
- 88% of members with CAD reported controlled blood pressure and 69% achieved a LDL value of < 100.
- 68% of members with diabetes reported they perform blood glucose monitoring, up from 58% at initial assessment and above the program Commercial Book of Business (BOB) rate.
- 42% of members with diabetes report A1C values of 7% or less, up from 32%, and 80% report LDL values of 130 or less. Lower A1C values indicate the ability to maintain healthy insulin levels for an extended period.

Please note the measurement criteria for claims-based outcomes requires all members to have 12 member months of eligibility with DMAS during the evaluation period examined. This is due to the fact that most tests are done annually. In addition, claims-based outcomes are for all DMAS members. Relative percent changes that were statistically significant are indicated with an asterisk.



[1] Evaluation Period for claims-based measures is 2005 through 2006

*The difference between 2005 and 2006 results is considered statistically significant at the 0.05 level using a two-tailed paired test.

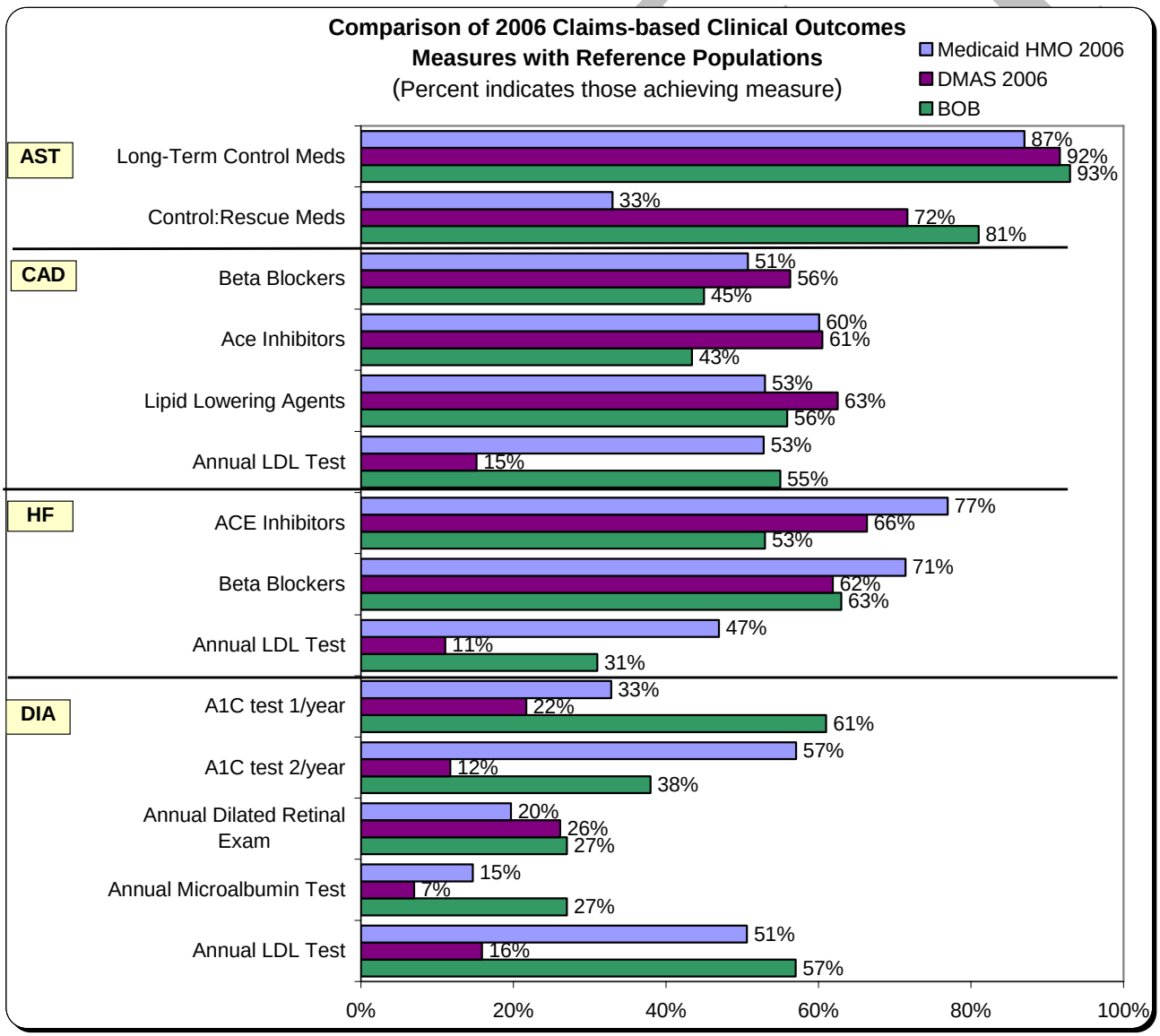
Based on claims results, there were marked improvements from 2005 to 2006:

- Prescriptions for medications specific to asthma management improved among members.
- Prescription rates for beta blockers and ACE inhibitors increased or were maintained among members with CAD and HF. Furthermore, beta blockers use among DMAS members was higher than the BOB rate.
- LDL testing rates declined across conditions. Nurse Consultants were notified of this finding and an interactive voice response campaign is planned to proactively address the importance of this test with managed members.
- Although stable, A1C and microalbumin testing rates for members with diabetes were low when compared to the BOB rate. This is influenced by the high number of pediatric members under management as physicians may not require A1C or microalbumin tests for minors. Minors comprise a very small percent of the total BOB rate.
- Dilated retinal exams increased to 26% during the year. A small change, but again, given the number of children managed with diabetes, this is a very positive result.

Comparison of 2006 DMAS Outcomes to a Reference Population

DMAS's 2006 outcomes were compared to outcomes for a reference Medicaid population and HMC 2006 Commercial Book of Business (BOB) results. In the first year of management for all four conditions, DMAS population results were favorable for 6 of 14 claims-based clinical measures when compared to the reference Medicaid group. Outcomes for 3 of 4 CAD outcomes are greater than the BOB results.

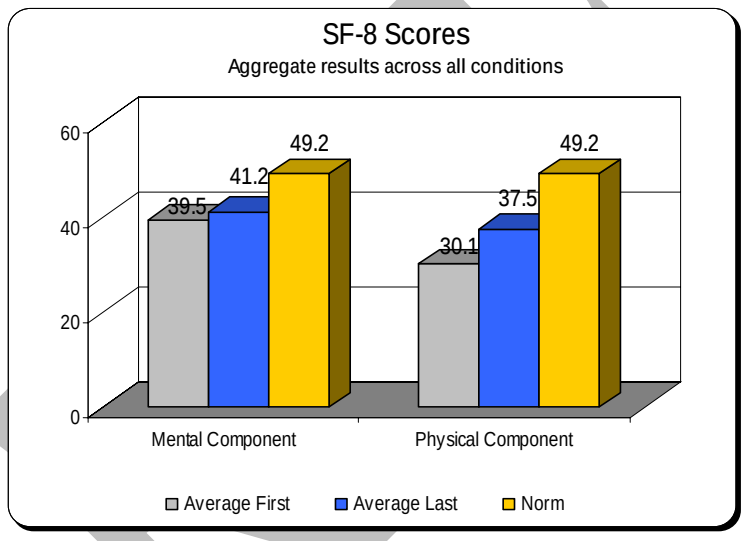
Please note that the DMAS and reference Medicaid populations are not comparable in terms of length of time with the program. While both include adult and pediatric members, reference Medicaid population members have been under management with HMC for over five years. However, despite the difference in program management, results for DMAS are often favorable to this long-standing client. In addition, this data provides DMAS with an indication of how it compares to other Medicaid populations along with HMCs book of business results.



Outcomes Summary – High Intensity Members

As members improve adherence to guidelines, they can optimize their health status. Member-specific intervention plans are developed with goals to improve health process and status outcomes that are important for optimal health.

Members experienced marked improvements in their mental and physical functioning based on average SF-8 scores. There was a 4% relative improvement in mental function scores and a substantial 24% improvement in physical function scores for participants. These are particularly favorable findings for the DMAS population as depression was the most frequently reported comorbid condition cited by assessed members. Please note the component norms shown below are derived by Quality Metric, owner of the SF-8 survey, and represent the general population, not a diseased population. Therefore, scores approaching the general population norm is a certain indication of health status improvement for members with chronic conditions.

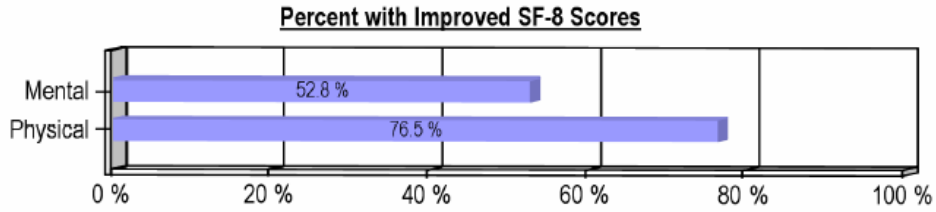


		Mental Score				Physical Score			
Primary Condition	Number of Cases with First / Last	Average First Measure	Average Last Measure	Percent Change	Change Significant*	Average First Measure	Average Last Measure	Percent Change	Change Significant*
Asthma	114	39.23	40.50	3.2 %	No	30.18	38.20	26.6 %	No
CAD	76	40.44	41.96	3.8 %	No	29.56	34.97	18.3 %	No
CHF	61	41.74	41.09	-1.6 %	No	28.34	36.97	30.5 %	No
COPD	N/R*	N/R*	N/R*	N/R*	N/A*	N/R*	N/R*	N/R*	N/A*
Diabetes	149	38.36	41.35	7.8 %	No	31.14	38.33	23.1 %	No
Total	**400**	**39.52**	**41.19**	**4.2 %**	**No**	**30.14**	**37.45**	**24.2 %**	**No**

** 'Yes' indicates the change between first & last measure is considered statistically significant at the 0.05 level using a two-tailed paired t-test.*

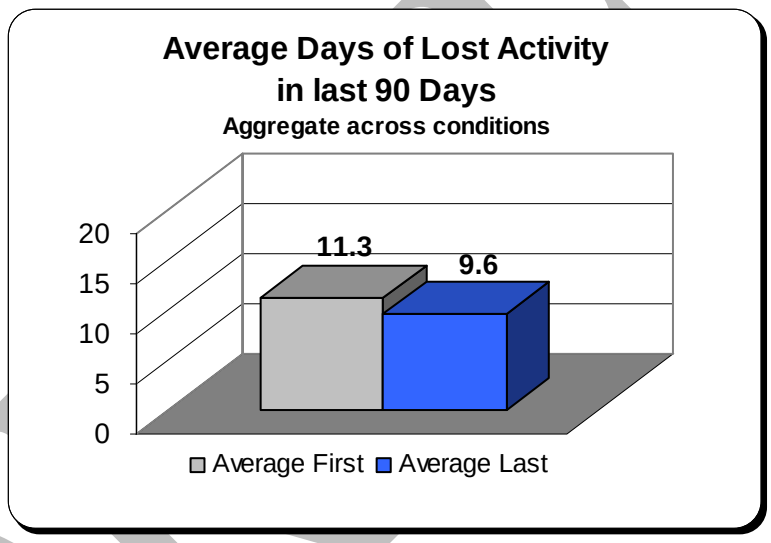
N/R (Not Reported) - Number of responses is insufficient (<5) to ensure member confidentiality or not a program condition. 'Total' reflects all respondents/results, including those not reported at the condition level due to insufficient sample size (N/R*).*

N/A (Not Applicable) - indicates that statistical testing is not appropriate due to small sample size (< 30 responses).*



Note: The SF-8 scores represent the member's self-perception of his/her physical and mental ability. This questionnaire is administered to all high intensity members during the initial health assessment and annually thereafter.

An important measure of health status is whether or not the members' condition limits or prevents them from performing their normal activities and is evidenced in days of lost activity. Across all conditions, the average number of days lost decreased significantly, from 11.3 days at first measure to 9.6 days at last measure. Members with asthma also made significant improvement, with days lost decreasing from 8.9 to 6.5 days. These are very positive results as it indicates increased productivity among managed members and relates to the member's willingness to make changes in the self-management of their condition.



Primary Condition	Number Responding	Total Days at First Measure	Avg Days at First Measure	Total Days at Last Measure	Avg Days at Last Measure	Percent Change	Significant Change*
Asthma	391	3,483	8.91	2,544	6.51	-27.0 %	Yes
CAD	122	1,354	11.10	1,160	9.51	-14.3 %	No
CHF	106	1,989	18.76	2,197	20.73	10.5 %	No
COPD	N/R*	N/R*	N/R*	N/R*	N/R*	N/R*	N/A*
Diabetes	191	2,259	11.83	1,843	9.65	-18.4 %	No
Total	**812**	**9,142**	**11.26**	**7,765**	**9.56**	**-15.1 %**	**Yes**

* 'Yes' indicates the change between first & last measure is considered statistically significant at the 0.05 level using a two-tailed paired t-test.

N/R (Not Reported) - Number of responses is insufficient (<5) to ensure member confidentiality or not a program condition. 'Total' reflects all respondents/results, including those not reported at the condition level due to insufficient sample size (N/R*).*

N/A (Not Applicable) - indicates that statistical testing is not appropriate due to small sample size (< 30 responses).*

CLAIMS UTILIZATION and FINANCIAL SUMMARY

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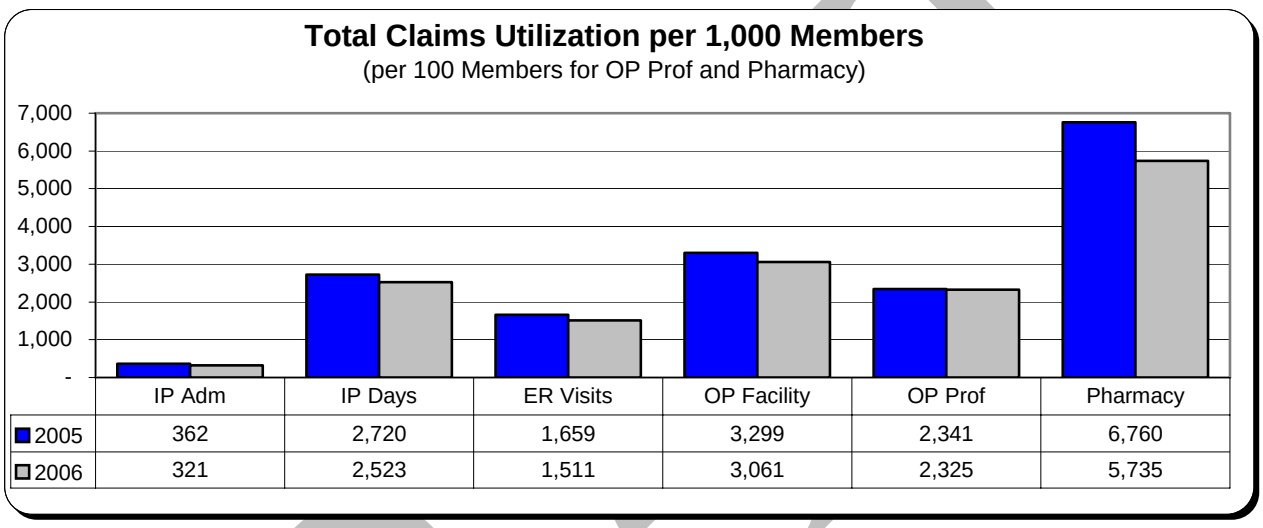
Claims Utilization and Expense Summary – Aggregate Population

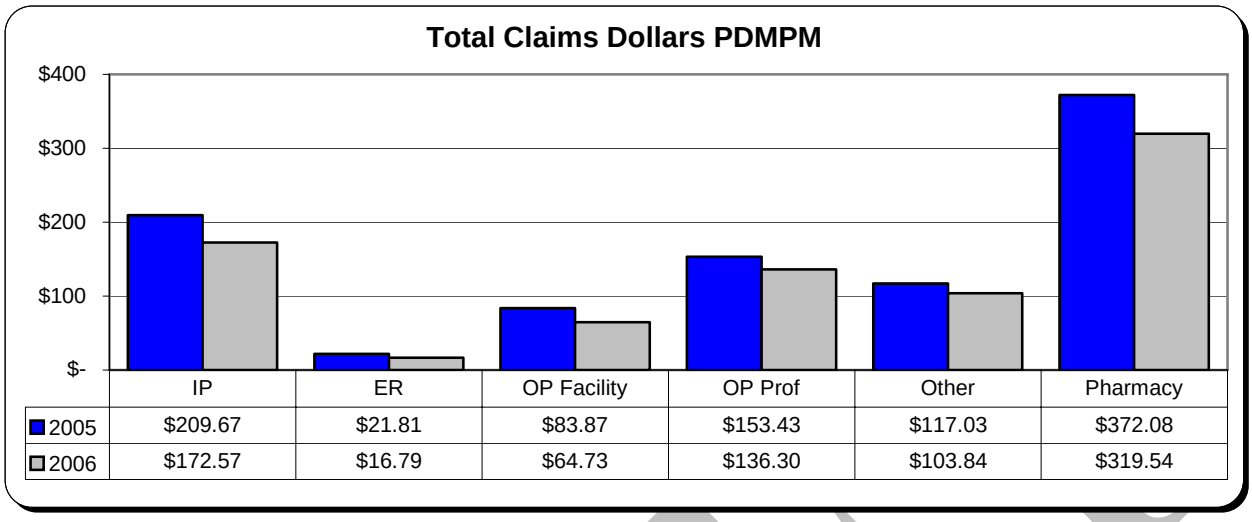
The following sections of the report address claims utilization and expense for DMAS members across all diagnoses and for condition-specific diagnoses. As noted in the Methodology found in the Appendix, cost and utilization trends were applied. Outliers were identified and removed from the analyses. Outliers are defined as members with a total per diagnosed member per month (PDMPM) expense that is four or more standard deviations from the average PDMPM expense.



	IP Adm	IP Days	ER Visits	OP Facility	OP Prof	Pharmacy
2005	362	2,720	1,659	3,299	2,341	6,760
2006	321	2,523	1,511	3,061	2,325	5,735

[1] Baseline utilization has been trend-adjusted. Source: DMAS

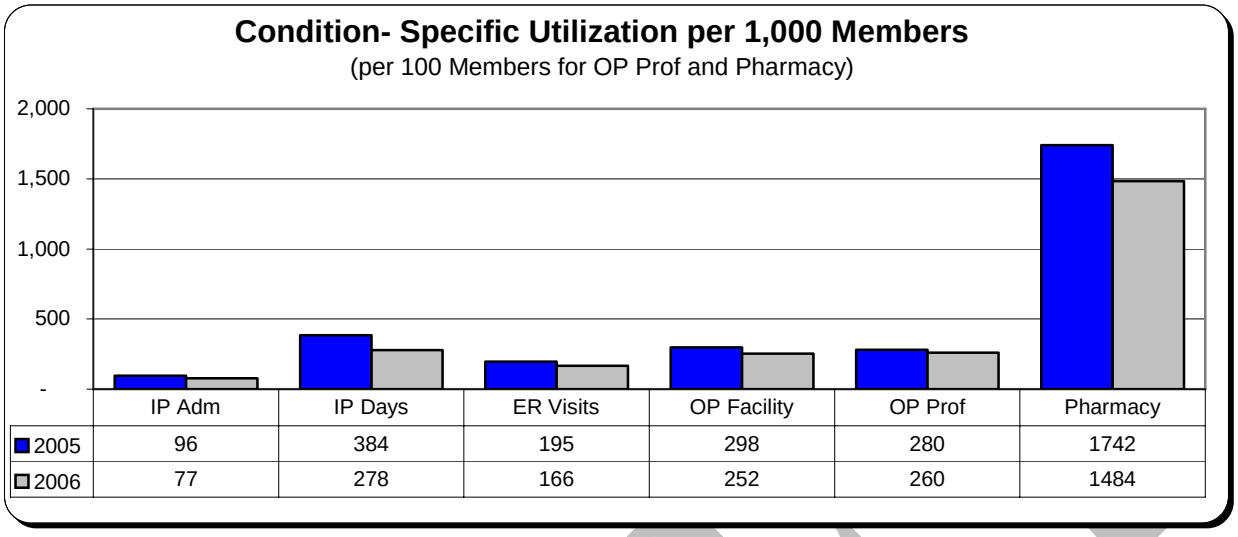
- For DMAS members in 2006, inpatient days per 1,000 members were down 7%. These favorable declines were driven by decreases in utilization for members with asthma and pneumonia.
- Total emergency room visits were down 9%. Visits related to non-specific symptoms, contusions and respiratory infections were the most frequent reasons for ER visits. The decline in ER utilization for condition-specific claims was driven by a decline in emergency room visits related to asthma and diabetes. This is extremely positive considering that half of identified members are minors with asthma.
- Outpatient facility utilization declined 7% and outpatient professional utilization was basically unchanged. Outpatient visits typically correlate to testing rates and indicate members are more knowledgeable of their condition and seek to have routine and preventive care treatments performed in the outpatient or office settings.
- Overall pharmacy utilization decreased 15%. With management and education, it is expected that medication use would increase among members with chronic diseases. With Medicaid populations, HMC has found that the rate of prescriptions may decline as members are educated about proper use and dosage of recommended therapies. It is notable that scripts for condition-specific medications like beta blockers and long-term control medications increased, indicating proper pharmacotherapy.



	IP	ER	OP Facility	OP Prof	Other	Pharmacy
2005	$209.67	$21.81	$83.87	$153.43	$117.03	$372.08
2006	$172.57	$16.79	$64.73	$136.30	$103.84	$319.54

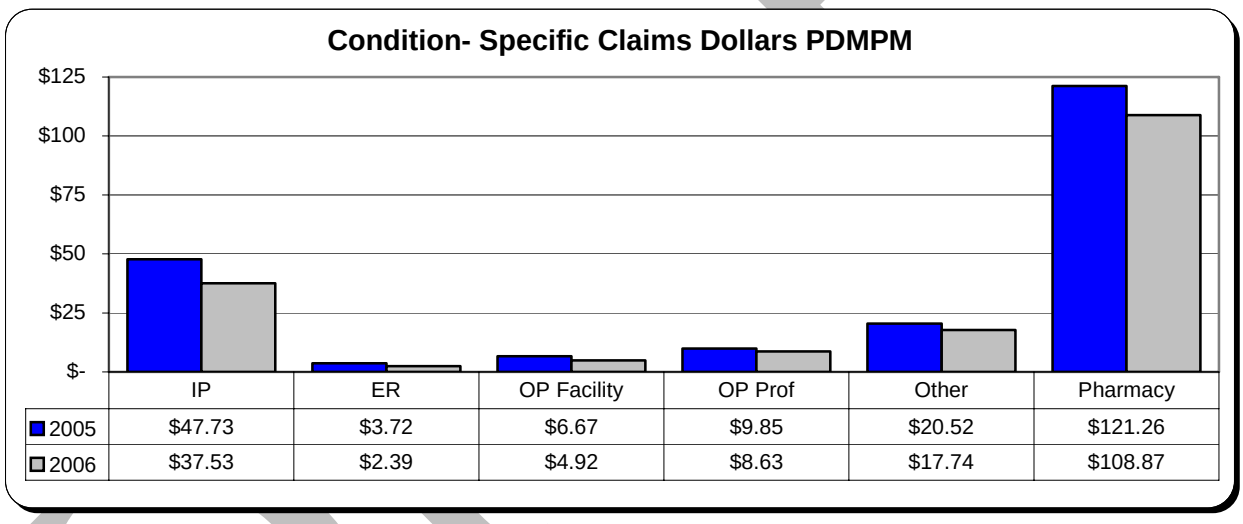
[1] Baseline expense has been trend-adjusted. Source: DMAS

- For DMAS members, total medical expense PDMPM decreased 16% in 2006 when compared to 2005. This increase was driven by an 18% ($37 PDMPM) decrease in inpatient expense.
- Following the decreased inpatient utilization, inpatient expense declined, driven by drops in expense related to asthma and heart disease. The largest driver of inpatient expense was related to members receiving institutionalized care for psychoses, namely manic depression.
- There was a 23% decrease in ER expense, driven by reduced costs related to the treatment of members with asthma as well as a decline in expense related to non-specific symptoms (aches and pains).
- Following the decline in the rate of filled prescriptions, pharmacy expense declined 14%, driven by a decrease in scripts for gastric acid secretion reducers and antipsychotics.



	IP Adm	IP Days	ER Visits	OP Facility	OP Prof	Pharmacy
2005	96	384	195	298	280	1742
2006	77	278	166	252	260	1484

[1] Baseline utilization has been trend-adjusted. Source: DMAS



	IP	ER	OP Facility	OP Prof	Other	Pharmacy
2005	$47.73	$3.72	$6.67	$9.85	$20.52	$121.26
2006	$37.53	$2.39	$4.92	$8.63	$17.74	$108.87

[1] Baseline expense has been trend-adjusted. Source: DMAS

- For condition-specific inpatient measures, program goals were also achieved with a 28% decline in days per 1,000 members and a 20% decrease in inpatient admissions, further illustrating the program impact.
- It is very positive that inpatient admissions and subsequent expense related to asthma, respiratory infections and ischemic heart disease declined in 2006.
- Outpatient professional utilization was fairly stable; professional expense fell 12%.
- The decline in ER utilization for condition-specific claims was driven by a decline in emergency room visits related to asthma and diabetes. This is extremely positive considering that half of identified members are minors with asthma who are most likely to seek emergency care for asthma triggers rather than attempt self-management practices.
- Overall, the rate of prescriptions filled decreased 15% in Year 1. As mentioned earlier, this is somewhat unexpected given the program goal to increase adherence to appropriate drug regimen. However, education related to the proper use and dosage of medication may lead to a decline in medications as members take drugs appropriately. This finding ties to the fact the rate of filled prescriptions for long-term control medications increased for members with asthma as did beta blockers for members with cardiac conditions.

Program Financial Outcomes

The incremental savings return for DMAS members is based on total claims expense (medical and pharmacy). Expense is weighted by member months for the incident and prevalent populations. Due to the member month weight, PDMPM claims totals shown below will not tie to the non-weighted PDMPM claims totals reported on previous pages.

- Based on total claims expense and using cost trend factors supplied by DMAS, members experienced gross savings of $127.83 per diagnosed member per month (PDMPM).
- Gross savings exceeded program fees in 2006 for a net savings rate of 12%, resulting in year over year savings of $9.34 for each dollar invested in the program.
- It is important to note that the savings are attributable to both the prevalent and incident populations within DMAS, with savings driven by the incident, or more recently identified members. This indicates the impact HMC's interventions were able to make in a short time period for persons identifiable with a chronic condition.

Virginia Department of Medical Assistance Services

DM Program Savings Reconciliation Calculation using Trends Supplied by DMAS
For the Twelve Months Ending December 31, 2006

Period 1: 1/1/2005 through 12/31/2005
Period 2: 1/1/2006 through 12/31/2006

Medical claim PDMPM financial trend rate:	37.1%
Pharmacy claim PDMPM financial trend rat	39.5%

Measurement Period Analysis

	Period 1 Prevalent	Period 2 Prevalent	Period 1 Incident	Period 2 Incident	Period 1 Overall	Period 2 Overall
Time periods: Twelve months ending	12/31/05	12/31/06	12/31/05	12/31/06	12/31/05	12/31/06
Number of people identified	9,025	10,184	3,214	5,093	12,239	15,277
Total member months	106,149	94,032	35,595	49,346	141,744	143,378
mm weight	74.9%	65.6%	25.1%	34.4%		
	* untrended *		* untrended *			
Total incurred medical costs	$ 45,769,899		$ 14,805,219			
Total incurred pharmacy costs	$ 31,276,476		$ 6,530,231			
elow trended and capped where applicable	* trended *	* capped *	* trended *	* capped *		
Total incurred medical costs	$62,750,532	$ 48,855,816	$20,297,955	$22,007,056		
Total incurred pharmacy costs	$43,630,684	$ 35,755,712	$9,109,672	$10,058,879		

Savings Calculation

	Period 1 Prevalent Total PDMPM	Period 2 Prevalent Total PDMPM	Period 1 Incident Total PDMPM	Period 2 Incident Total PDMPM	Period 1 Overall Total PDMPM	Period 2 Overall Total PDMPM
Trended average monthly expense per identified member	*$1,002.19*	$899.82	*$826.17*	$649.82	*$941.61*	$813.78
Gross Savings per identified member (before fees)		**$102.37**		**$176.35**		$127.83
Gross savings rate		10.21%		21.35%		13.58%

Calculation of Annual Gross Savings, Net Savings, Net Savings Rate and Return on Investment (ROI)

	PDMPM	Gross
Total gross savings	$127.83	$18,328,578
Program cost example for Evaluation year	$13.69	$1,962,736
Net savings	$114.14	$16,365,842
Net savings rate	12.12%	
Incremental Savings (Gross savings divided by program cost)	**$9.34**	

Claims Utilization and Expense Detail – Aggregate Population

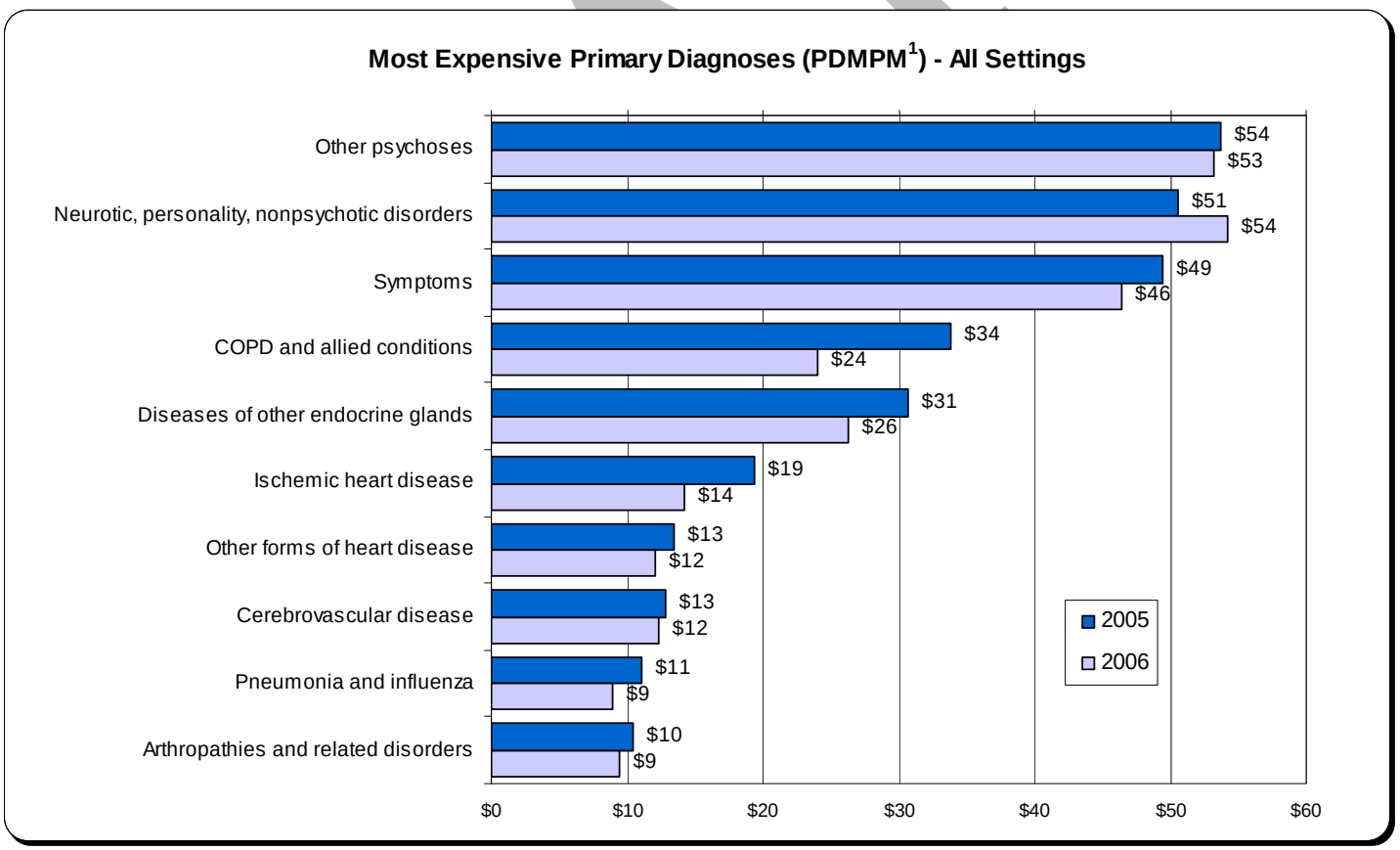
In addition to enhanced health status, better overall condition management leads to positive changes in healthcare utilization. Improvements in health process and health status outcomes were realized for the DMAS population, as well as improvement in total utilization and expense patterns. The following analysis identifies the most frequent drivers of utilization and expense by setting to further explain changes in financial patterns over the evaluation periods.

Top Diagnosis Categories

There were a number of diagnostic categories with improved utilization and expense in 2006. There are also areas that provide further opportunities for management.

All Settings

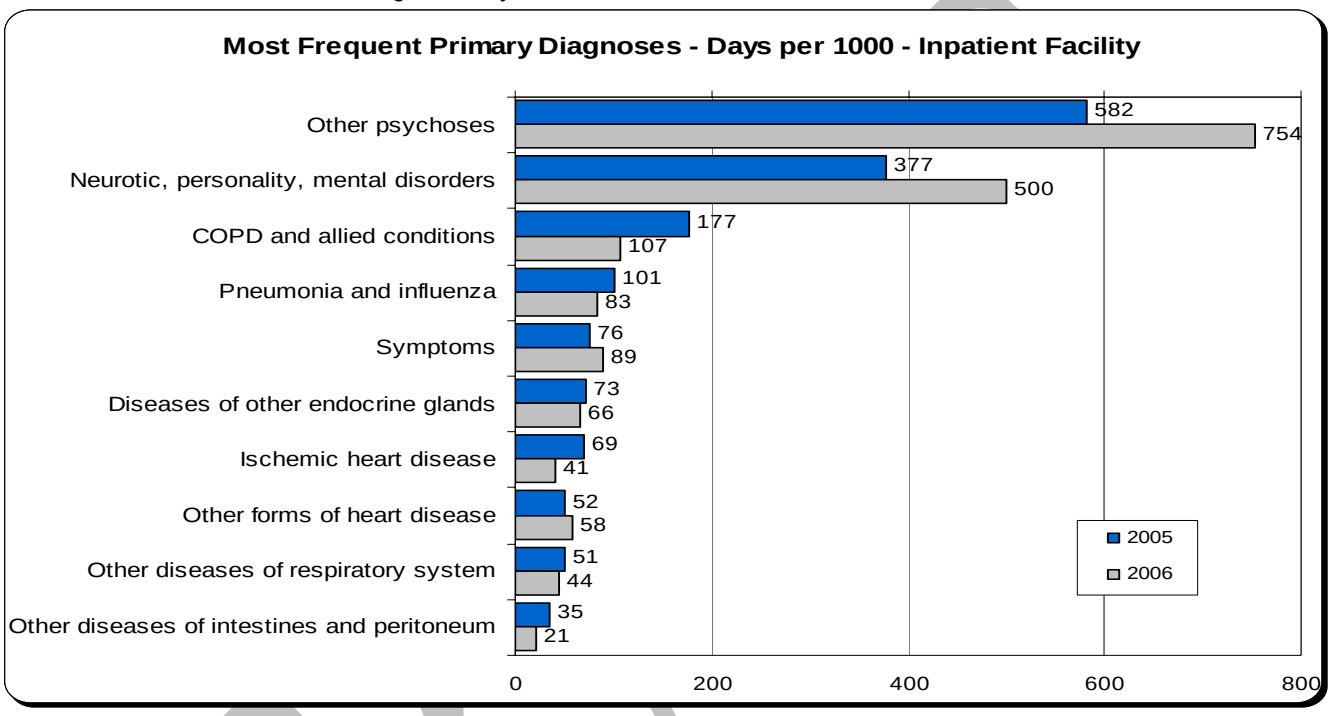
- It is notable that across all settings, there were declines in expense related to ischemic heart disease and asthma (included in the ICD-9 group 'COPD and allied conditions').
- It is notable that the top 10 ICD-9 diagnosis groups are very different for Medicaid populations, compared to other managed populations. Typically, ischemic heart disease is the most expensive diagnosis group whereas for this population, mental health issues are the cost drivers.



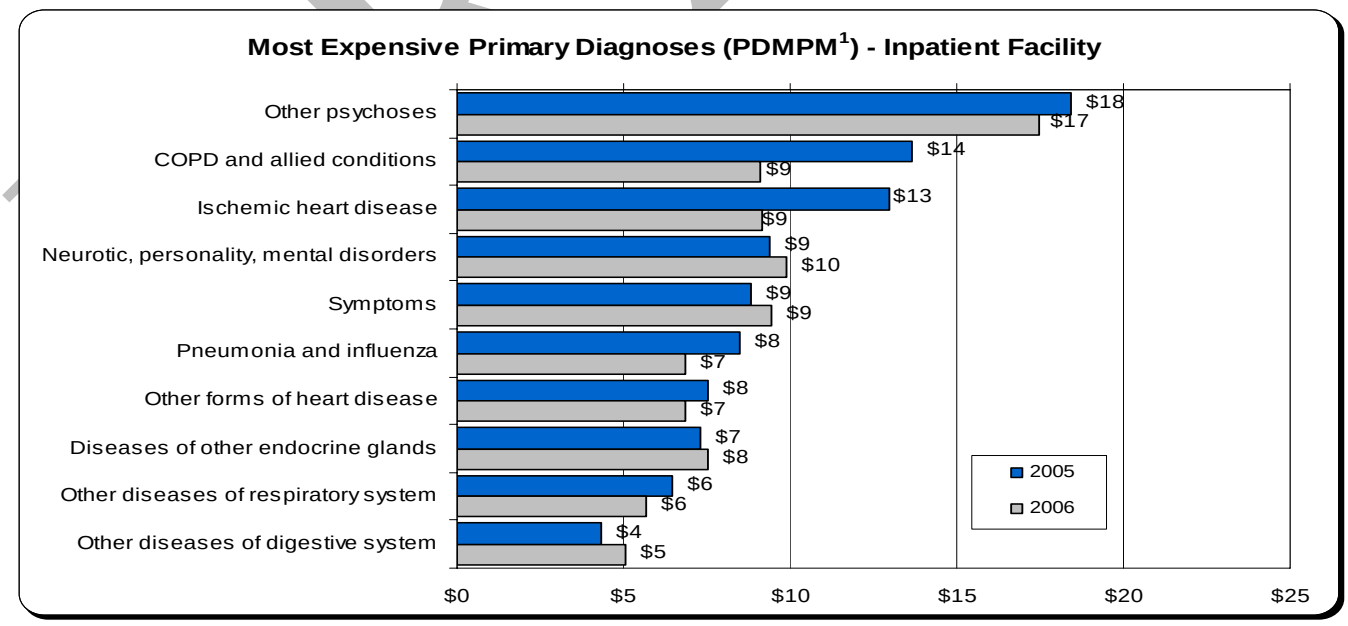
[1] 2005 expense has been trend-adjusted. Source: DMAS.

Inpatient Facility

- The graph below illustrates that days per 1,000 related to mental health disorders increased substantially in 2006 and comprise the first two most frequent primary diagnoses and the most expensive. Further analysis revealed that two primary groups (Medicaid Adults and Medicaid Pediatrics) accounted for the majority of these admissions.
- Days per 1,000 decreased for conditions managed by the program, including 'COPD and allied conditions' as well as 'Ischemic heart disease' and diabetes. COPD and allied conditions are grouped together because they are interrelated conditions. Length of stay related to 'other forms of heart disease' did increase in 2006.



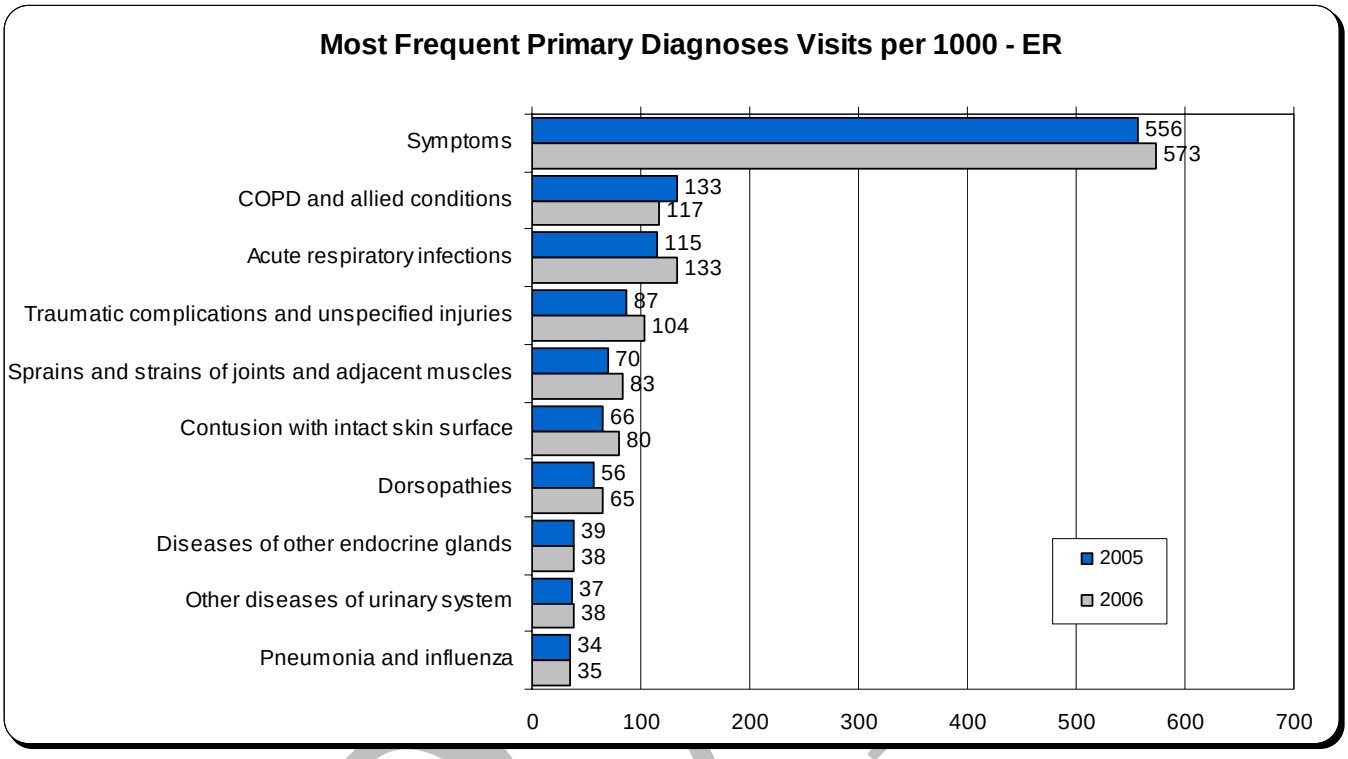
[1] 2005 utilization has been trend-adjusted. Source: DMAS.



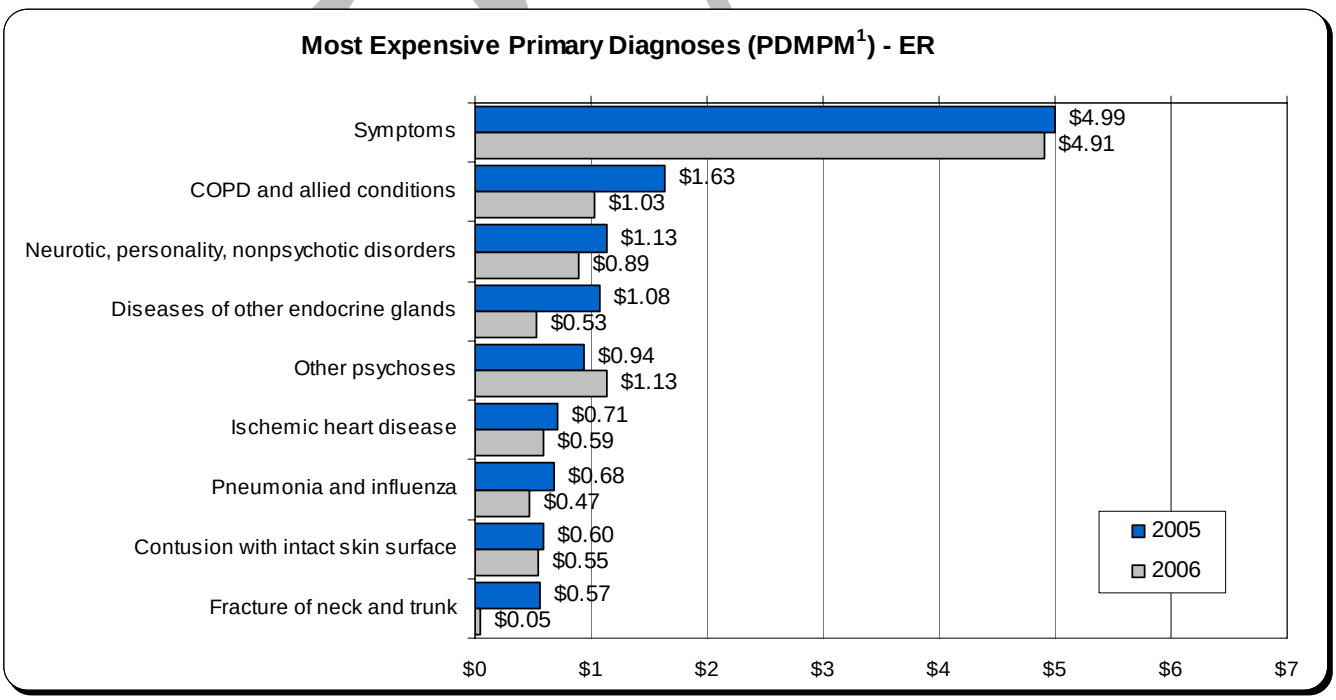
[1] 2005 expense has been trend-adjusted. Source: DMAS.

Emergency Room Facility

- Appropriate use of emergent care is a primary goal of the program and is essential to the population as the majority of managed members are minors with asthma.
- Across the ER setting, utilization declined 9%. Among the top 10 most frequent diagnoses categories, utilization was stable or experienced small increases. Notably, visits per 1,000 related to 'COPD and allied conditions' declined and visits related to diabetes were stable.



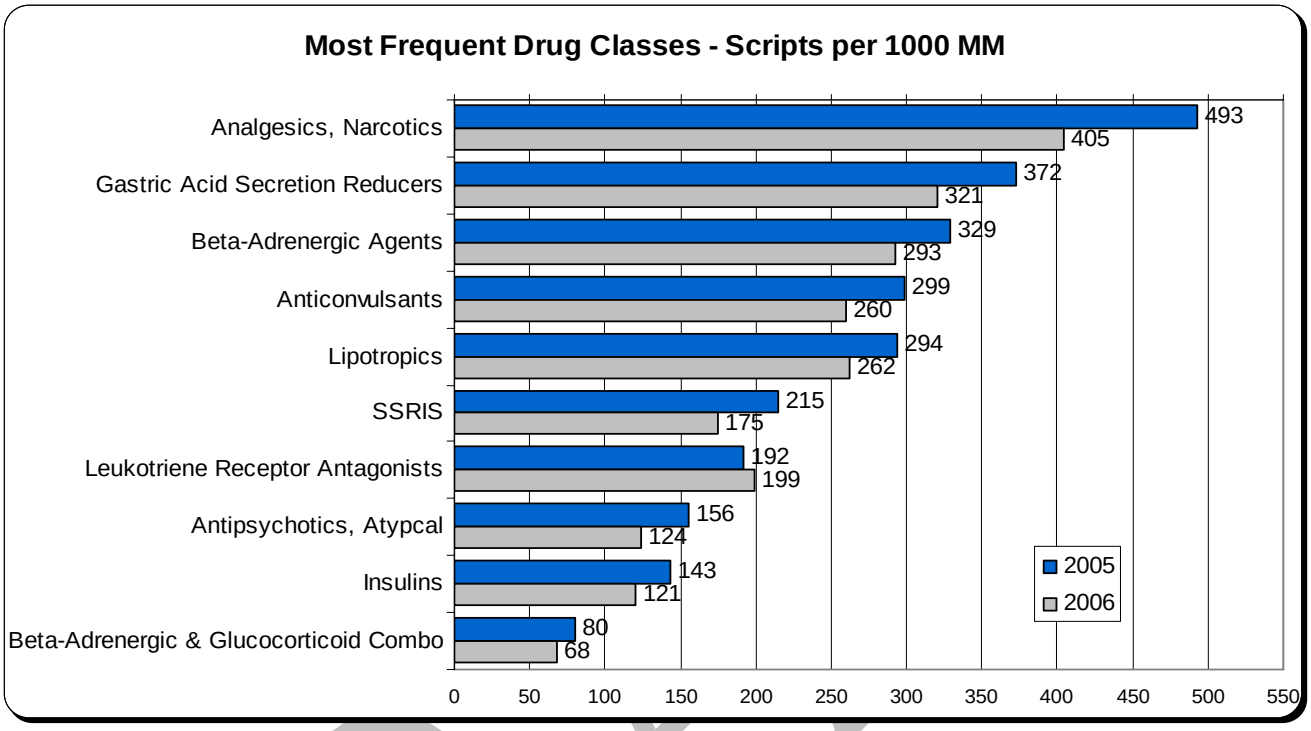
[1] 2005 utilization has been trend-adjusted. Source: DMAS.



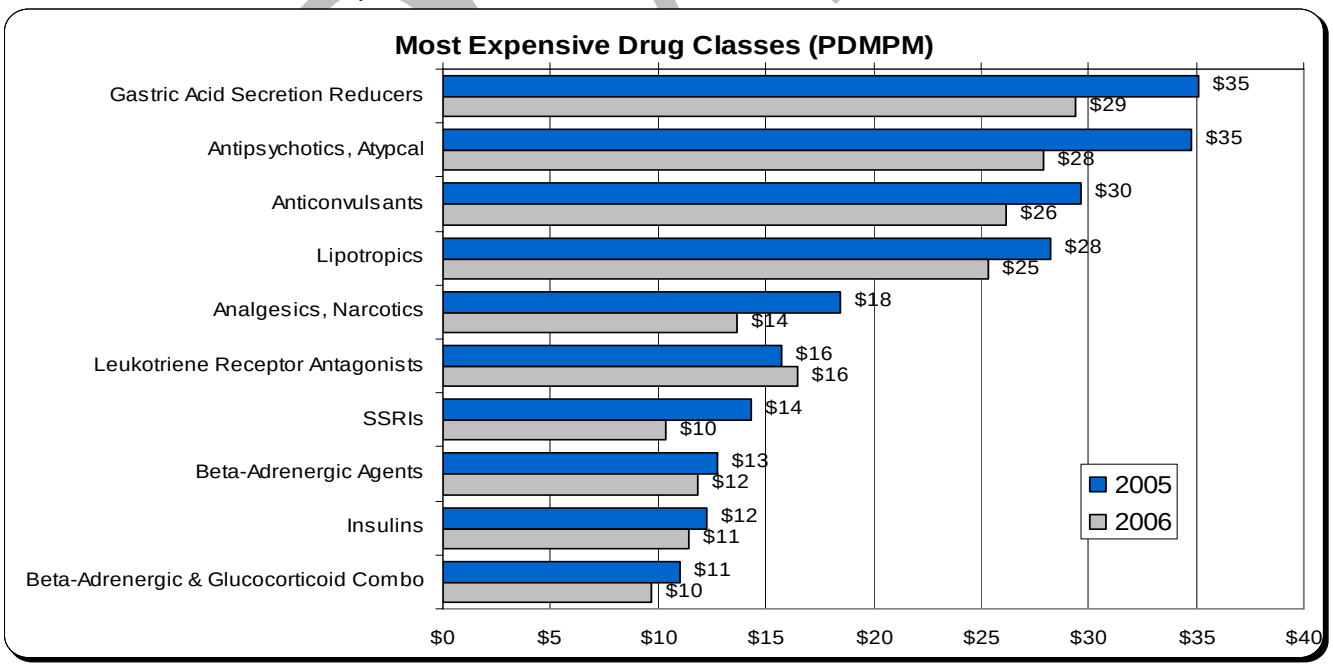
[1] 2005 expense has been trend-adjusted. Source: DMAS.

Pharmacy Utilization

- The graphs below illustrate that prescriptions filled decreased for nine of the top ten drug classes. Following the decreased utilization, expense PDMPM also decreased for most drug classes.
- For the drug classes reviewed, scripts for medications related to managed conditions also declined. However, for members managed for heart disease and asthma, condition-specific medications such as beta blockers and long-term control meds increased and indicate members are adhering to a necessary drug regimen.



[1] 2005 utilization has been trend-adjusted. Source: DMAS.



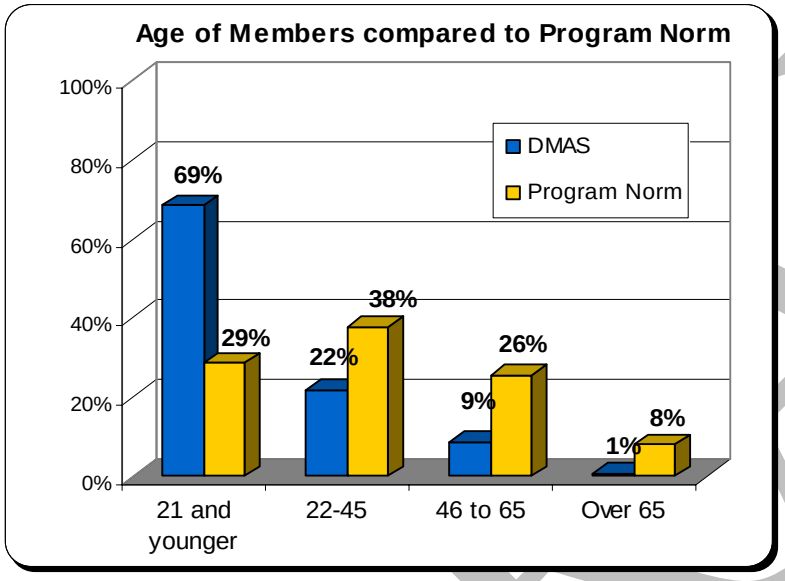
[1] 2005 expense has been trend-adjusted. Source: DMAS.

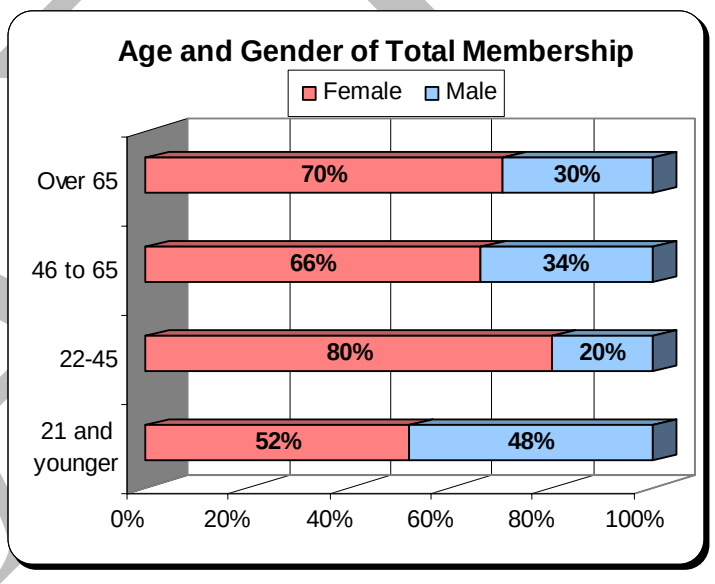
PROGRAM ACTIVITY

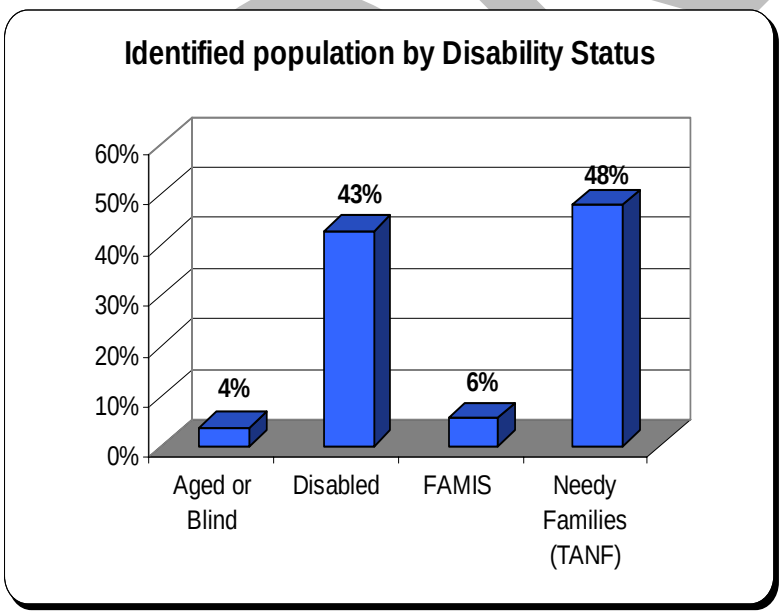
Program Activity

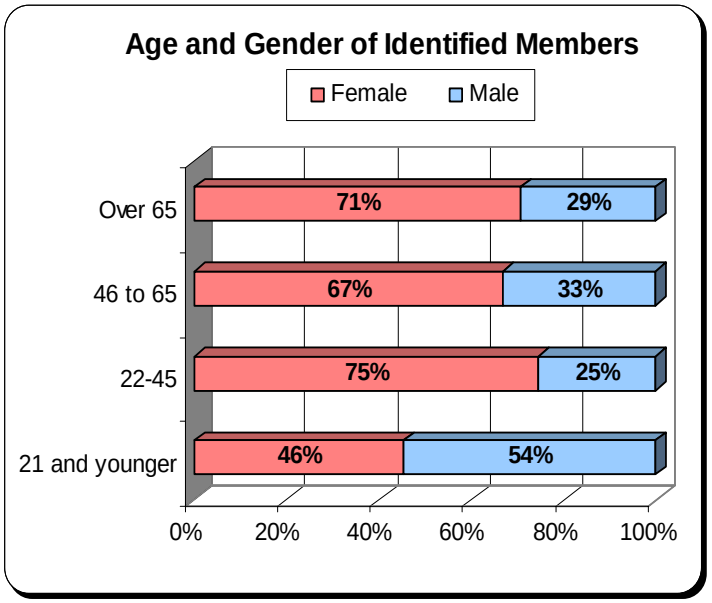
Member Profile

- As expected, the DMAS population is much younger than the book of business population, with 69% of members under age 21, compared to 29% of the book of business is in the same age range.
- The vast majority of DMAS eligible members are female and the average age is 18. This is consistent with the services provided by a Medicaid plan, which focuses on the medical and financial needs of low-income families and disabled persons.
- The age and gender distribution for members identified for program management is very similar to that of the DMAS eligible population.
- By disability status, 48% of identified members are receiving temporary assistance and 43% are disabled.



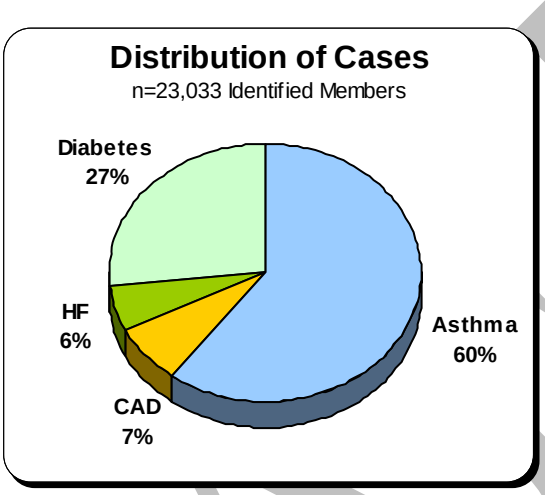






Member Identification and Intervention Level

- As of December 31, 2006 23,033 cases have been created for the DMAS population (including adult and pediatric cases) since program inception on 1/1/2006. Nearly half of those cases (48%) were for pediatric members with asthma or diabetes.
- The majority of members were identified as having asthma (60%), followed by 27% with diabetes. This distribution is atypical compared to the BOB, but is expected due to the high number of pediatric members in the DMAS population.



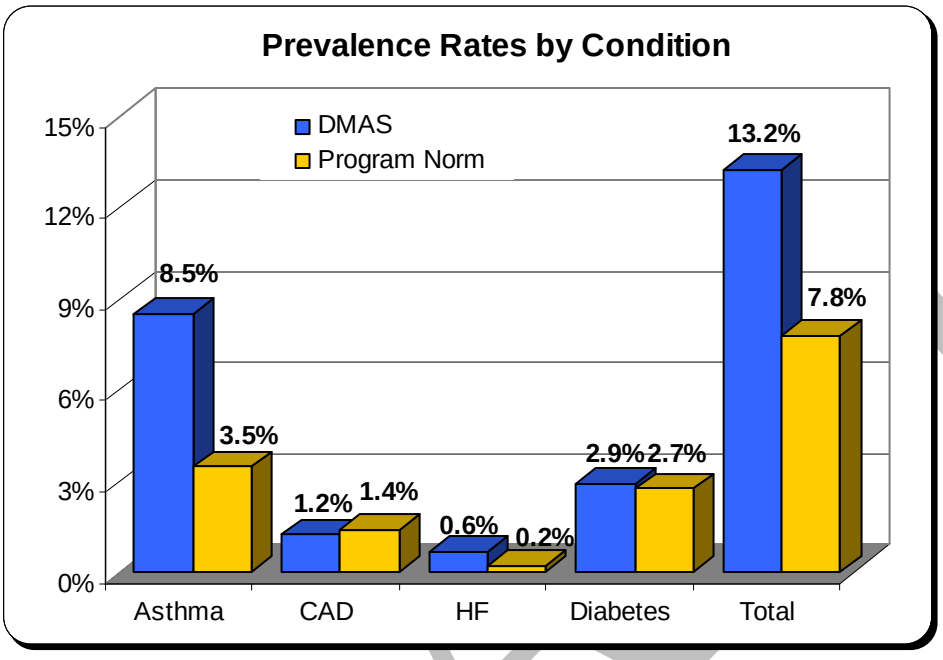
Intervention Level for Cases Under Management

- Sixty-nine percent of the total identified Medicaid cases remain in the program as of September 2007. The remainder is closed for various reasons, with the majority closed due to lost coverage or eligibility.
- Of the DMAS cases that remain under management, nearly one-third (31%) are receiving high intensity management. The high intensity rate for DMAS is expected to be above the HMC BOB rate (18%) given the complexity of the population.

Condition	High Intensity Identified Cases	% of Cases for Condition	Standard Intensity Identified Cases	% of Cases for Condition
Asthma	3,796	53%	10,108	64%
CAD	751	11%	931	6%
HF	695	10%	622	4%
Diabetes	1,877	26%	4,253	27%
Total	7,119	31%	15,914	69%

Prevalence Rates

The total prevalence rate for the DMAS Medicaid population is much higher than that of the Program Norm, driven by a high rate of members with asthma. As addressed in previous pages, this is due to a greater proportion of pediatric cases in the DMAS membership. Please note that prevalence rates are based on data as of the report date and include managed cases with a primary condition. The measure is calculated as the total cases under management divided by eligible membership.



Program Activity: High Intensity Participants

Assessment Status

As of September 2007, 33% of the high intensity members with cases created through December 31, 2006 have been assessed for knowledge of their condition, level of adherence to recommended clinical guidelines, and compliance with their physician's plan of care. Among the 2,831 cases not assessed, HMC was unable to reach 58% of members by phone. This is a known problem among Medicaid populations and HMC will work with DMAS on efforts to update current telephone numbers and addresses. A breakdown of the high intensity members and their case disposition regarding assessments follows:

Assessment Status for High Intensity Cases Under Management

Description	Number*	Percent
Assessed	1,410	33.25%
Not Assessed	2,831	66.75%
Engaged in contact process	259	6.11%
Declined Assessment	101	2.38%
Unable to Reach	2,471	58.26%
Transferred to Case Management	0	0.0%
Other	0	0.0%
Total	4,241	100.0%

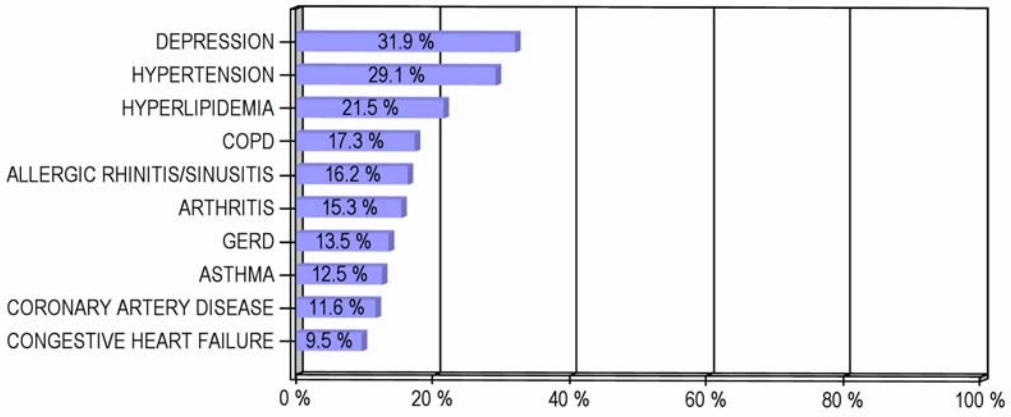
** High intensity cases under management.*

Comorbid Conditions

The majority (80%) of high intensity members report having comorbid conditions; therefore, management of these members is complex. Comorbid conditions are self-reported by the member during the clinical assessment. The most prevalent comorbid conditions were depression and hypertension, both of which are often associated with chronic diseases like CAD and diabetes. For the reference Medicaid population, 86% of assessed members reported having comorbid conditions.

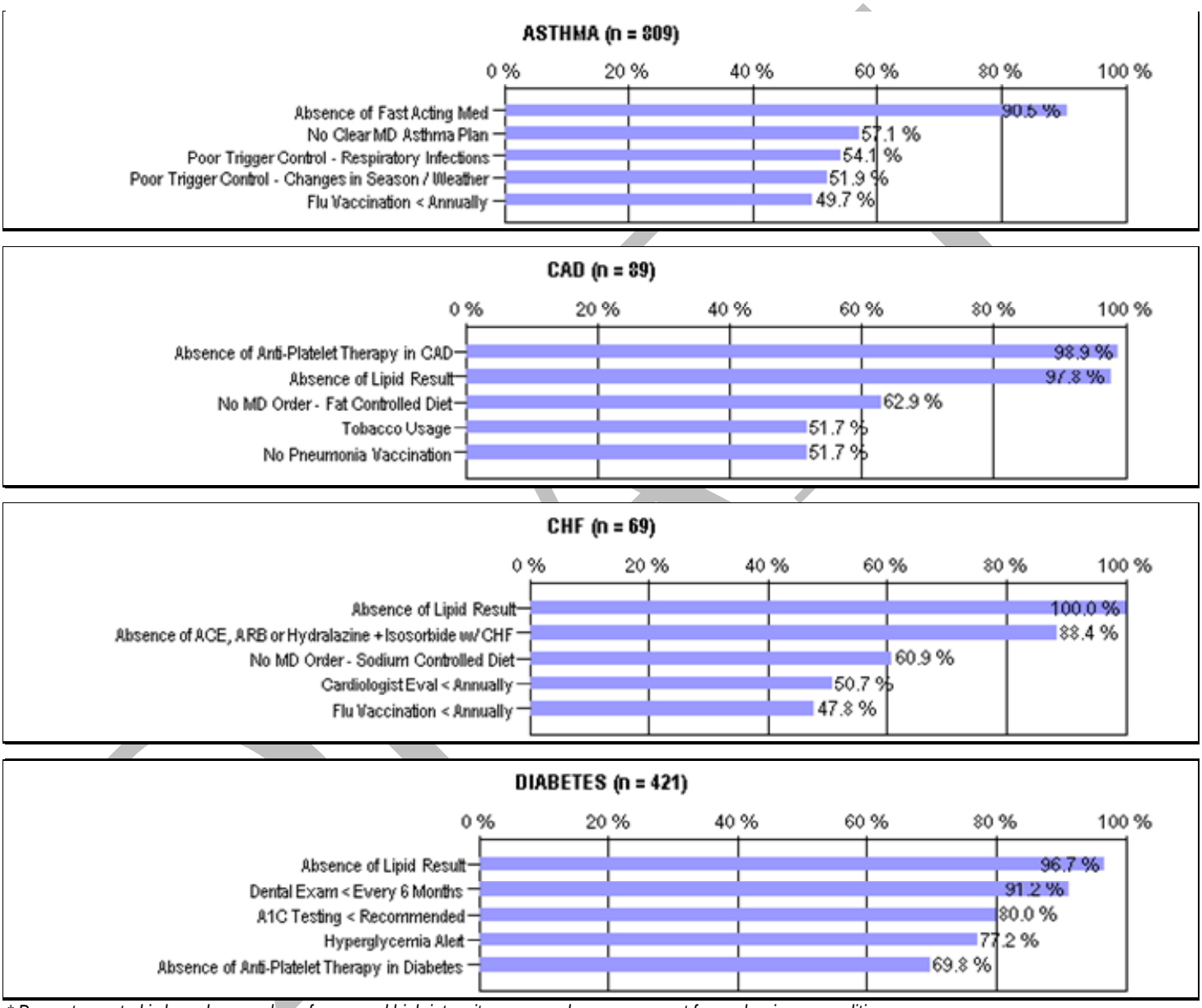
Most Frequently Reported Comorbid Conditions

(Percent of high intensity cases under management)



Non Compliance Issues*

Through the assessment process, areas where participants are not in compliance with recommended medical/pharmacy guidelines are identified. These areas are targeted by nurse consultants, pharmacists and other ancillary specialists to attain increased compliance. The following shows the top non-compliance issues identified for each primary condition.



** Percent reported is based on number of assessed high intensity cases under management for each primary condition.*

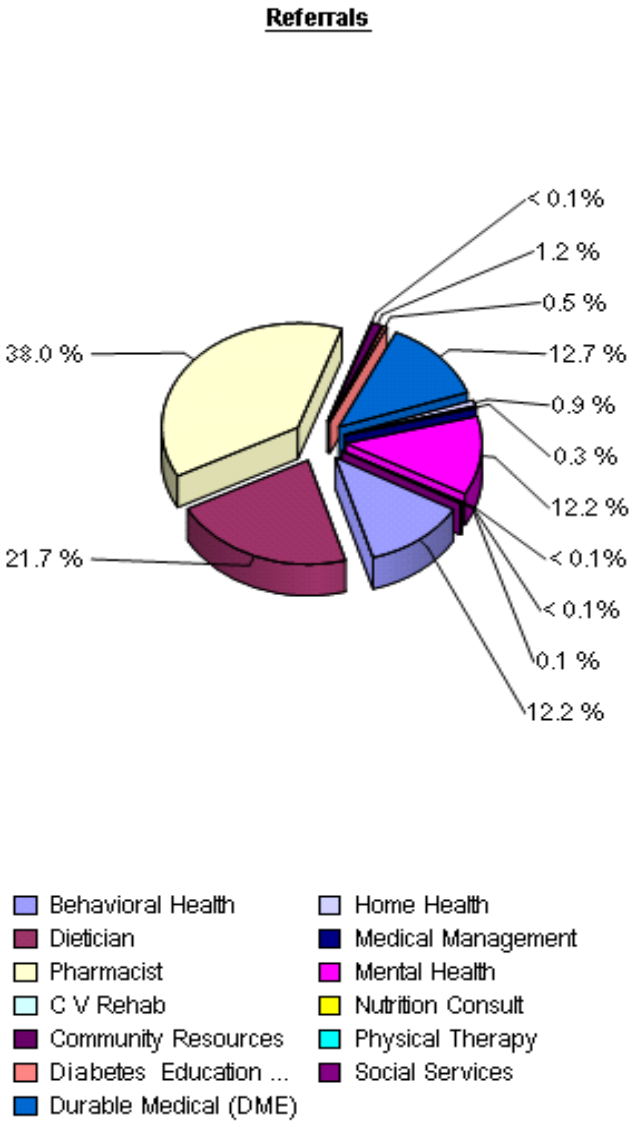
Referrals

Members may receive referrals to specialized resources as needed. Internal referrals detailed below are for resources within HMC, whereas external referrals are for resources outside of HMC. Members were most frequently referred for consultations with a pharmacist, followed by a dietician. Routinely, pharmacy consults comprise the majority of referrals because members receive consultations related to their medications, ranging from necessity of the drug to daily dosage. Many times, these consultations involve both the member and the member's physician.

Type of Referral	Number of Cases with Referral*	Percent	Percent of Assessed Cases with Referral
Internal			
Behavioral Health	408	12.2%	28.9%
Dietician	725	21.7%	51.4%
Pharmacist	1,268	38.0%	89.9%
External			
C V Rehab	1	< 0.1%	< 0.1%
Community Resources	39	1.2 %	2.8 %
Diabetes Education Classes	16	0.5 %	1.1 %
Durable Medical (DME)	425	12.7 %	30.1 %
Home Health	30	0.9 %	2.1 %
Medical Management	9	0.3 %	0.6 %
Mental Health	409	12.2 %	29.0 %
Nutrition Consult	3	< 0.1%	0.2 %
Physical Therapy	3	< 0.1%	0.2 %
Social Services	4	0.1 %	0.3 %
Total	3,340	100.0%	

** A case may have a referral in multiple categories. Report is for cases under management.*

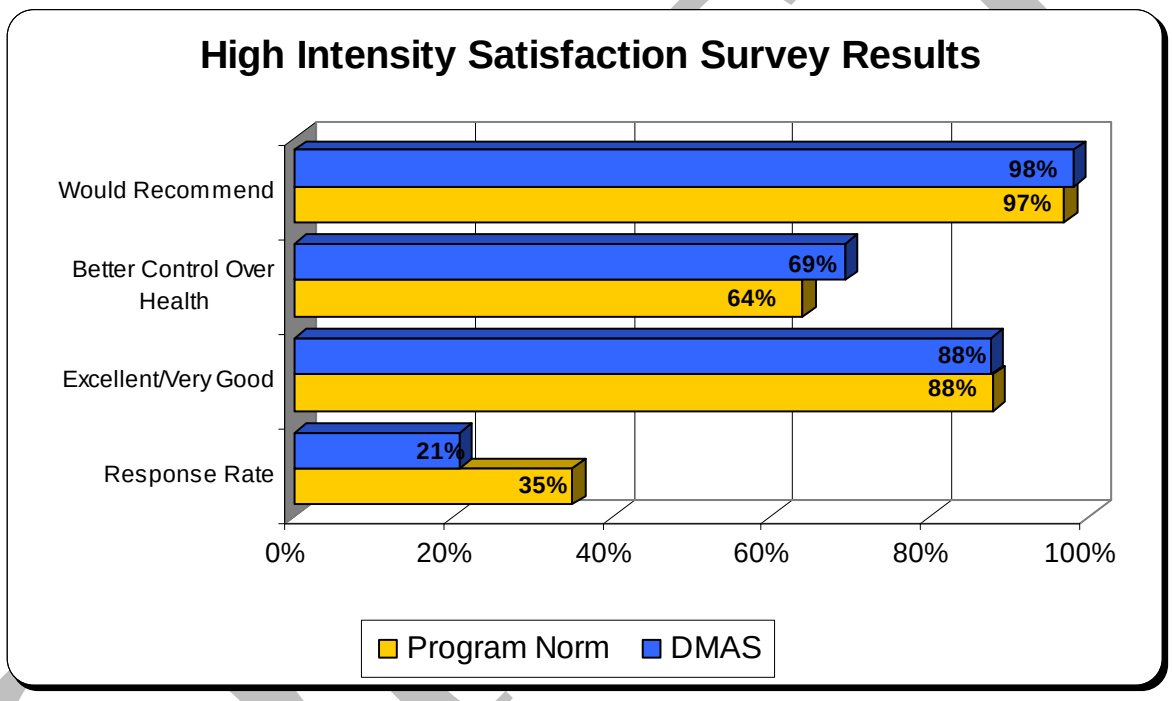
Distinct cases with a referral	1,322
High intensity assessed cases	1,410
Percent of high intensity assessed cases	93.8%



Member Satisfaction

The success of the program depends on constructive partnership with members. Participant satisfaction with the program in the first year of management is high, as measured through surveys mailed to members. Surveys are sent to all active, high intensity members after 10 months in the program and annually thereafter. Complete survey results are provided in the appendix.

- Through the end of the evaluation period, 792 high intensity members were sent a satisfaction survey, and 164 surveys were returned, for a response rate of 21%. The response rate is below the Program norm (35%) but this is the first year of management and the response rate is expected to be somewhat low.
- 69% of satisfaction surveys completed by high intensity members under nurse care management indicated that they had better control over their health/condition as a result of being in the program.
- The majority of respondents (88%) rated the program as 'Excellent' or 'Very Good'.
- 98% of respondents indicated that they would recommend the program to others.



Member Testimonials

Comments given below are taken directly from satisfaction survey responses and further indicate the positive impact Nurse Consultants have with DMAS members.

- *Discussions with my nurse helps me to be more aware of certain things concerning my health that I should discuss with my doctor and it helps knowing there is someone a phone call away that cares.*
- *Excellent program, friendly nurses, your program has helped me a great deal. This program is a 10+.*
- *I feel all nurses, all mental health specialists I talked to showed me they cared about my physical & mental condition with a professional & compassionate respect.*
- *I would not change anything, maybe a little more checking on your patient more than once a month. Thank you.*

Clinical Case Study

Demographics

This member is a 56-year old female with a primary condition of Type 2 Diabetes. She also has CAD and Peripheral Vascular Disease (PVD) and had to have surgery this year on her leg. She was enrolled in the program on 3/22/06.

At the time of this member's enrollment, a comprehensive health assessment was initiated and completed. Baseline, self-reported health information was collected to supplement the data available from claims.

1. Co-morbid conditions include hypertension, hyperlipidemia, neuropathy, arthritis and PVD.
2. She has had trouble with a herniated disc in her back since 1996.
3. She reports having a heart attack in November of 2005.
4. She also reports having a heart murmur since she was a child.
5. She has had several operations on both legs d/t circulation problems.

Prescribed medications included: Metformin, Lantus, Vytorin, Aspirin, NTG, Xanax, Lasix and Lortab. Medications that have been added include Coumadin, Protonix, Plavix, Keflex, Zocor, Temazepam, Neurontin, and Cymbalta. The Aspirin and the Vytorin have since been discontinued or changed to another medication, and the course of Keflex was completed. The patient reports 100% compliance with taking her medications.

In addition to the patient reported information, HMC received the physician-ordered plan of care from the physician, which validated the information previously reported by the member.

Assessment, Education, Consultations, Complications and Results

During the year and half since this member enrolled, the Nurse Consultant has worked with the member on hyperglycemia and also on trying to decrease her stress through stress management. In the beginning this patient would often skip meals and then eat a big meal at night. We talked about proper meal timing and to make sure she did not go too long between meals both to help with her blood sugar control and also to facilitate weight lost. We also talked about signs and symptoms of both hyperglycemia and hypoglycemia and treatment options. The patient was eager to learn about improving her health.

In May 2006, this patient reported having less trouble with chest pain and also decreased stress. She stated that she was learning to not let other people's problems stress her out. She feels this has helped both her heart and blood sugar issues.

In August 2006, the patient reported having a clot in her left leg again and had to have more surgery. At this time she also reported improvement in her blood sugars. In September, she attended Diabetic Education Classes and reported that she felt she was getting a better handle on her diet and her blood sugars continue to improve.

In November 2006 we talked about a sick day plan and how to manage her diabetes in the event she became sick and could not eat. We also did a lot more regarding diet and carbohydrate counting and the member verbalized understanding. She felt she was finally starting to understand portions and types of food she needed to eat. We continued to work on improving her A1C level.

In January 2007, the patient reported improved blood sugars and her lipid results on 2/16/07 also showed improvement; A1C was at 10.4 at that time, down from 8.2, but her leg problems and infections have affected this in a negative way. In March 2007, she reported increased problems with chest pain and in May 2007 she had to have more surgery on her leg and more problems with infections.

Enrollment Status	Program Interventions	Most Recent Results
Total Cholesterol of	NCM educated on importance of obtaining	Member obtained test. 02/16/07

122 ,Triglycerides 205, HDL-35 and LDL-46 (12/28/05)	Lipid Profile test and understanding results.	Total Cholesterol – 125 (AHA <200) LDL – 58 (AHA <100) HDL – 43 (AHA >40) Triglycerides – 119 (AHA <150)
Hemoglobin A1c 13.5 (12/28/05) Self monitoring blood glucose results ranged from 159-201, but pt often had some much higher ones.	NCM discussed importance of managing diet, meds, and activity to prevent hyperglycemia. NCM also educated member on long-term complications of diabetes.	HbA1c on 02/16/07 was 10.4 (ADA <7.0). In Nov.'06 she was 8.2 Self monitoring blood glucose results ranged from 115-130
Lack of diabetes sick day plan (written or verbal) from physician	NCM discussed importance of having sick day plan in event of illness. Encouraged member to discuss with his physician, and sent patient teaching information.	Member discussed and developed a sick day plan with her NCM regarding how to manage his diabetes, diet, in the event of illness. Encouraged to also talk with MD.
Member had received flu and pneumonia vaccine	NCM educated member on importance of to obtain preventative flu and pneumonia vaccines. Individuals with chronic illnesses such as diabetes are more susceptible to complications of the viruses.	Member discussed with physician and received the flu vaccine again in 10/06.
Blood Pressure Monitoring BP unknown at enrollment	NCM educated on importance of obtaining instructions from physician on blood pressure monitoring.	Member obtained BP cuff through the program. BP on 9/11/07 was 130/58 (ADA <130/80).
Body Mass Index (BMI) 28.0 kg/m2	NCM referred member to DEC for assistance with fat/carb control diet.	BMI now is 26.0 kg/m2. Member states she is working on watching carbohydrates and calories in his diet. Felt some of his weight issues were related to trouble walking at times. Target BMI <25.
Exercise Moderate aerobic activity 3 days a week for 30 min	NCM encouraging member to continue with exercise plan.	Member continues to participate in moderate activity 3 days a week for 30-50 min.

Additional Assessment, Education, Consultations, Complications and Results

- Functional Health Assessment (SF-8) showed great improvement in both physical and mental scores.
    - Assessment is performed at program enrollment and annually thereafter. Baseline physical score was 30.68 with a baseline mental health score of 45.25. April 2007, physical score was 46.01 with a mental health score of 60.65. (General Population Norm is 49 for mental and physical health).

Plan for Continued Care Management

Nurse intervention calls will continue as well as calls from staff dietitians and pharmacist services. As the member continues to achieve program goals, she will be evaluated for program graduation.

Program Strategies and Initiatives

Numerous initiatives designed to deliver continued improvements in program outcomes have been implemented or are planned for the coming year. HMC looks forward to continued collaboration ensuring optimal identification and execution of initiatives and other effective strategies focused on improving the health of DMAS members.

Program Clinical Improvements

- In September 2007, HMC rolled out its Health Behavior Change Initiative. HBC is an applied methodology our health care professionals use to increase their ability to positively influence members' perceptions and behaviors regarding their health. HBC coaches members toward everyday choices that improve healthy behaviors and, as a result, clinical outcomes, while breaking down barriers such as resistance and ambivalence. HBC is particularly useful with individuals who are less motivated to make healthy behavior changes. HBC balances member-identified and personally relevant goals with structured guidance from our multidisciplinary team of health care professionals. HBC skills and strategies will help inspire members to become more knowledgeable about their health and take a more active role in improving it, a key component to lasting behavior change.

- In May 2007, HMC rolled out a "Voice-over-IP" or Voice-over-Internet-Protocol Telephony system across our five call centers nationwide. The new telephony system will help HMC to better connect with members. The new system will enable nurses and health care professionals to seamlessly communicate with one another regardless of where they are located across the country. Additionally, the "Voice-over-IP" system allows us to expand our network of health professionals, because the high-tech features of our call centers can be available to health professionals in remote locations or else those working from home. This translates to added coverage for members, both in hours of availability and in areas of expertise.

- The "Voice-over-IP" system has more interactive features:

    - Participants are now able to dial a five-digit extension that will connect them to their nurse's or health provider's direct line. This is important; as experts agree that higher levels of care are realized when people can easily reach the care manager they trust.
    - Members will now have the option to bypass waiting on hold. Instead, they can simply leave their phone number and hang up. The intuitive system will automatically redial the number and then transfer the member to the next available agent.
    - This state-of-the-art technology also enables HMC to extend its comprehensive audio library of medical topics to all participants enrolled in any of HMC's programs.
    - Member enrollment and continued engagement is crucial to the overall success of the program. In order to maintain the program's high level of member participation, HMC continues to provide sales and motivational training for the Enrollment team and Nurse Consultants to further develop their engagement skills.

- Wellpoint, Inc. launched a company-wide initiative to research health disparities among the various ethnic groups we serve. HMC will work with our corporate parent, to support this research effort. Our analytics team will collaborate with Wellpoint resources to target disparities in health outcomes for managed populations.

- The NCQA Review Oversight Committee awarded HMC full accreditation (Patient and Practitioner Oriented) for the following programs: asthma, CAD, HF, COPD, Diabetes, and Maternity, effective January 12, 2006 – January 12, 2009.

New Product Availability

HMC is broadening its suite of products to meet both clients' and participants' diverse needs as the health care industry evolves and consumer expectations change. Our care management programs assist individuals at all stages of health—from wellness prevention to advanced care management. HMC is a total health solution. New programs noted below may represent an excellent collaboration for HMC and DMAS:

Wellness & Prevention
Maternity Management
Advanced Care Management
Lifestyle Management

- Low Back Pain
- Musculoskeletal
- Oncology (Breast, Colorectal, Prostate, Skin Cancer)
- Vascular At-Risk (Hyperlipidemia, Hypertension, Metabolic Syndrome, Obesity)

Other Areas of Collaboration

HMC's management team is committed to the identification and implementation of strategic initiatives that further enhance our relationship and delivery of services to the DMAS population. HMC looks forward to continued collaboration to provide superior program delivery to DMAS members. We are confident that the initiatives and strategies outlined in this section will continue to support improved outcomes for your population.

APPENDICES

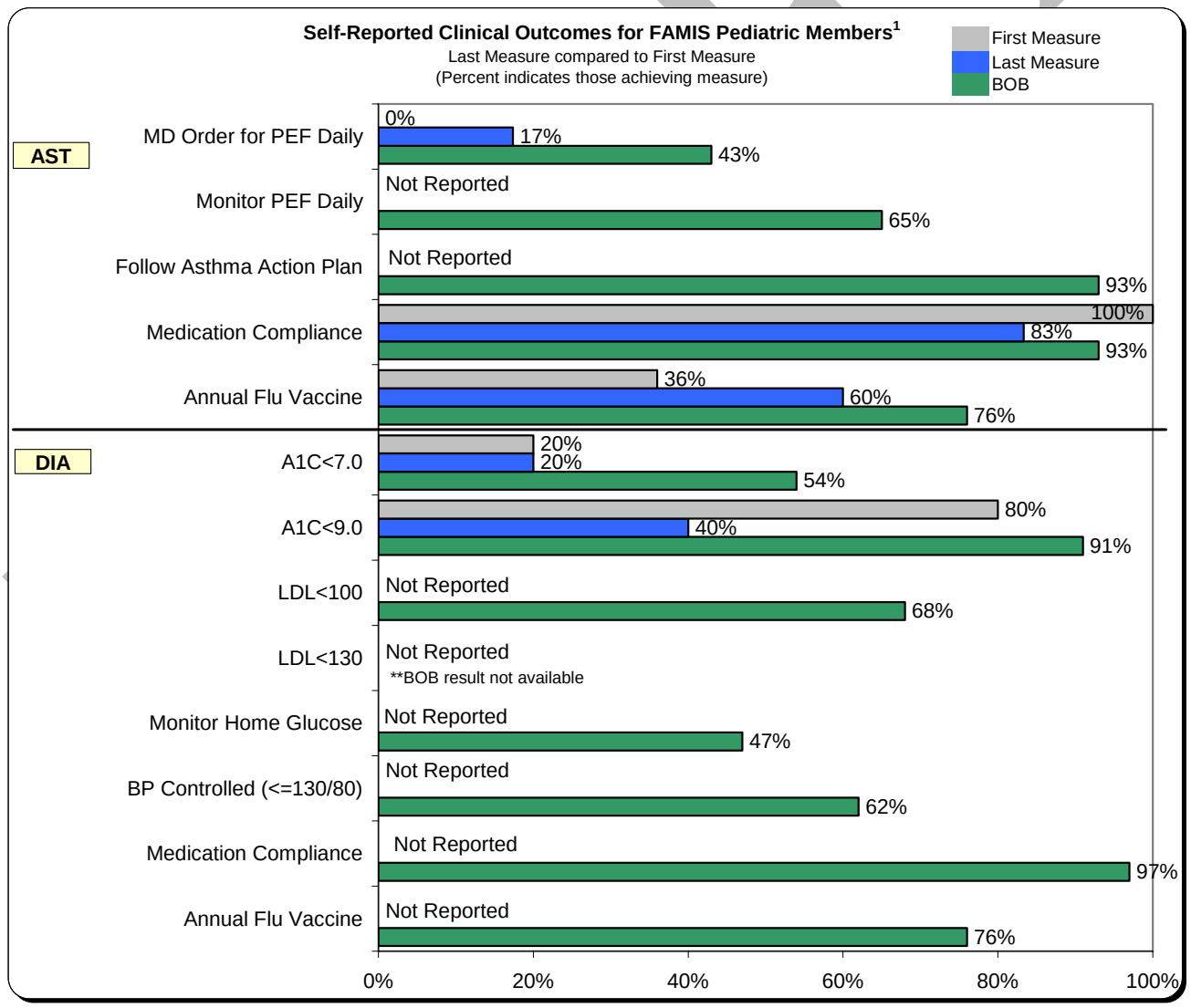
Clinical Outcomes and Utilization Summary by DMAS Group

The following pages provide clinical and financial results for the individual fee for service plans managed by HMC. These include the pediatric members in Family Access to Medical Insurance Security (FAMIS), Medicaid Expansion and Medicaid as well as the fee for service Medicaid program for adults and members under Home and Community Waivers.

Results are limited for several of the pediatric groups due to small numbers. Please note graphs only display results for the group's applicable conditions. For example, the FAMIS pediatric population does not have any members with CAD or HF and therefore these conditions are not displayed on the outcomes graphs.

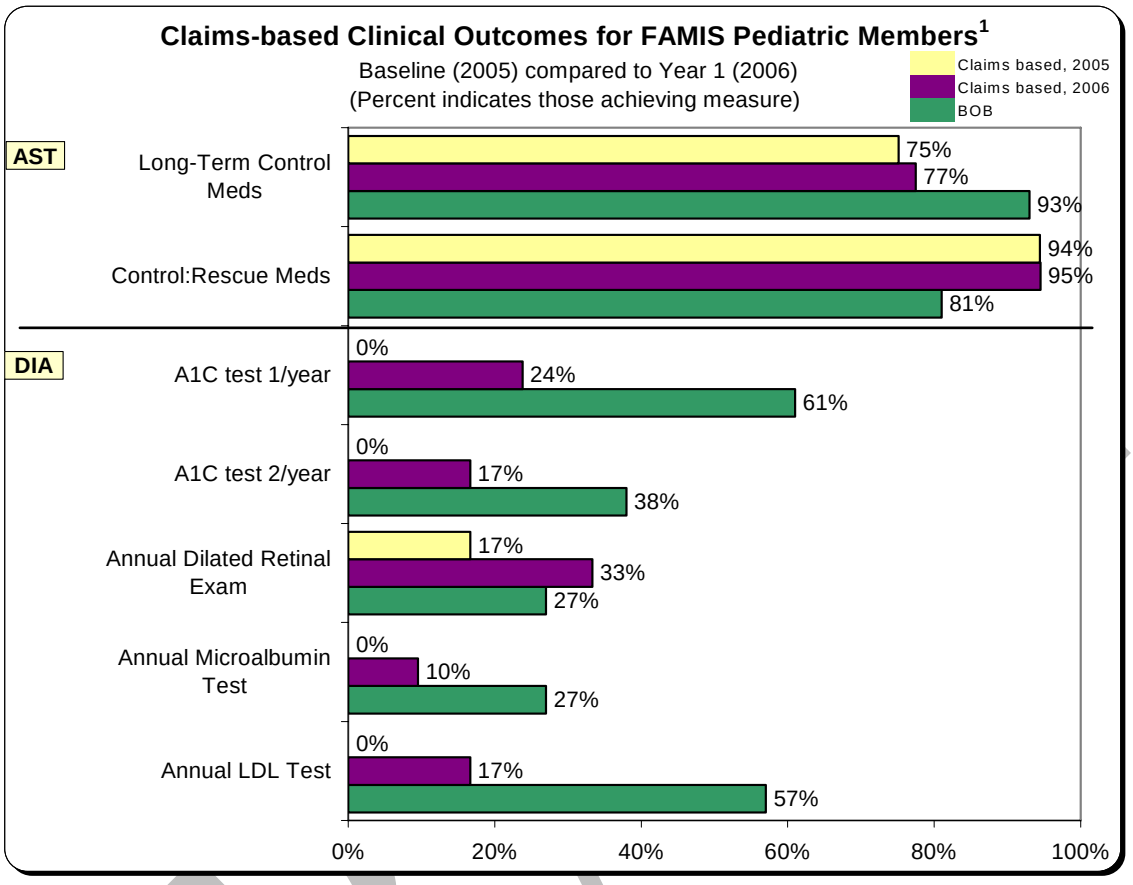
Methods applied to the individual group analyses are the same as applied to the aggregate population, where outliers have been removed and cost and utilization trends applied. Note that results for members in the Home and Community Waivers population are provided here but are not included in the aggregate analysis. The chart below displays members and their eligible member months, by individual group.

DMAS – Family Access to Medical Insurance Security (FAMIS); Pediatric Members



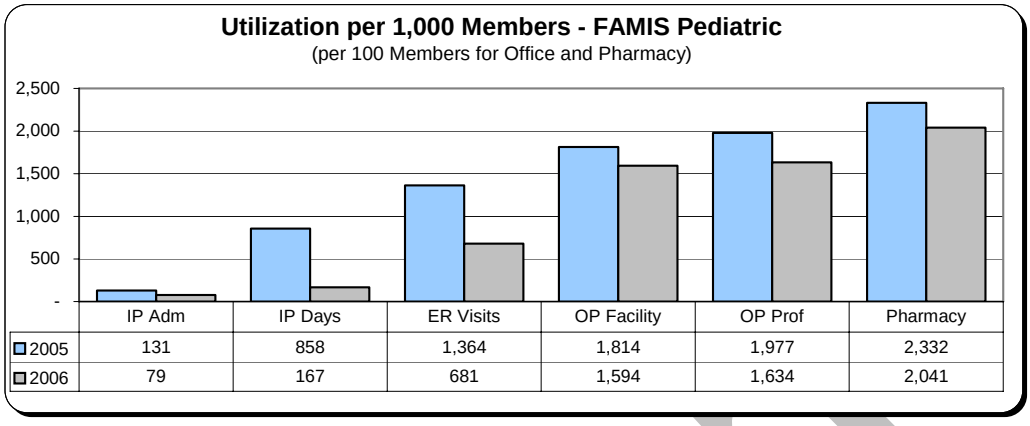
[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure.

* The difference between the first and last measures for self-reported data is considered statistically significant at the 0.05 level using a two-tailed paired test.



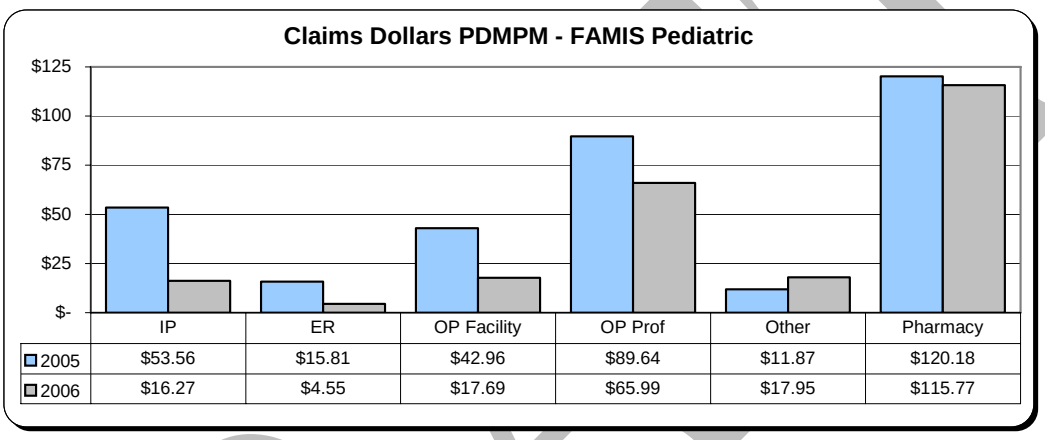
[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure. For claims-based measures, 2005 is compared to 2006.

*The difference between measures is considered statistically significant at the 0.05 level using a two-tailed paired test.



	IP Adm	IP Days	ER Visits	OP Facility	OP Prof	Pharmacy
2005	131	858	1,364	1,814	1,977	2,332
2006	79	167	681	1,594	1,634	2,041

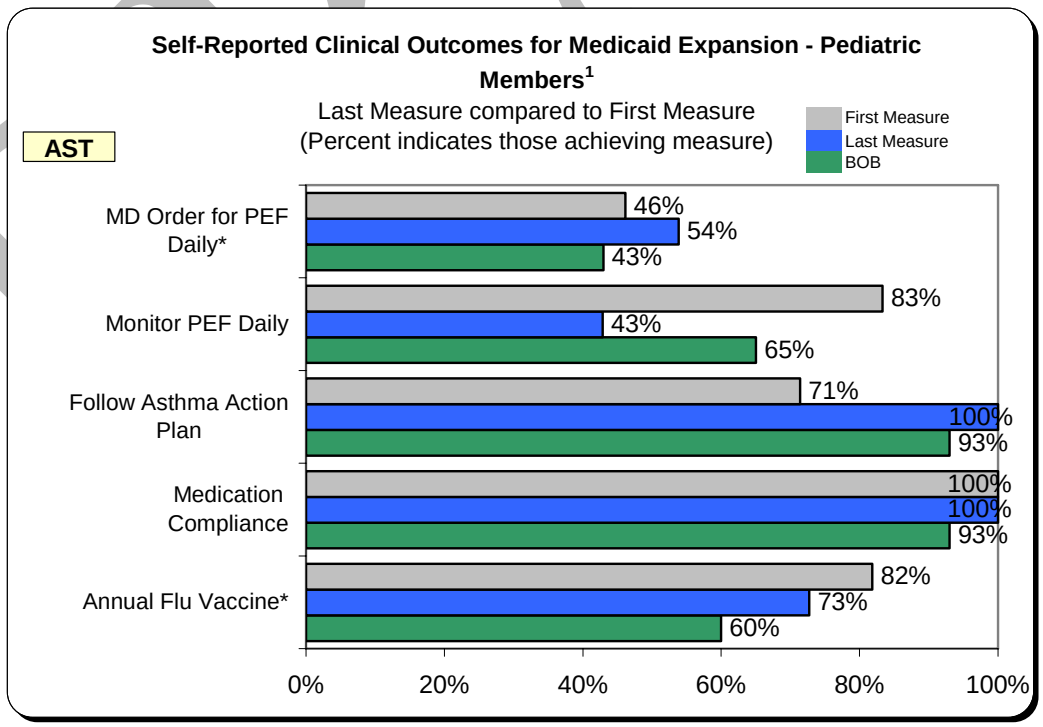
[1] Baseline utilization has been trend-adjusted.



	IP	ER	OP Facility	OP Prof	Other	Pharmacy
2005	$53.56	$15.81	$42.96	$89.64	$11.87	$120.18
2006	$16.27	$4.55	$17.69	$65.99	$17.95	$115.77

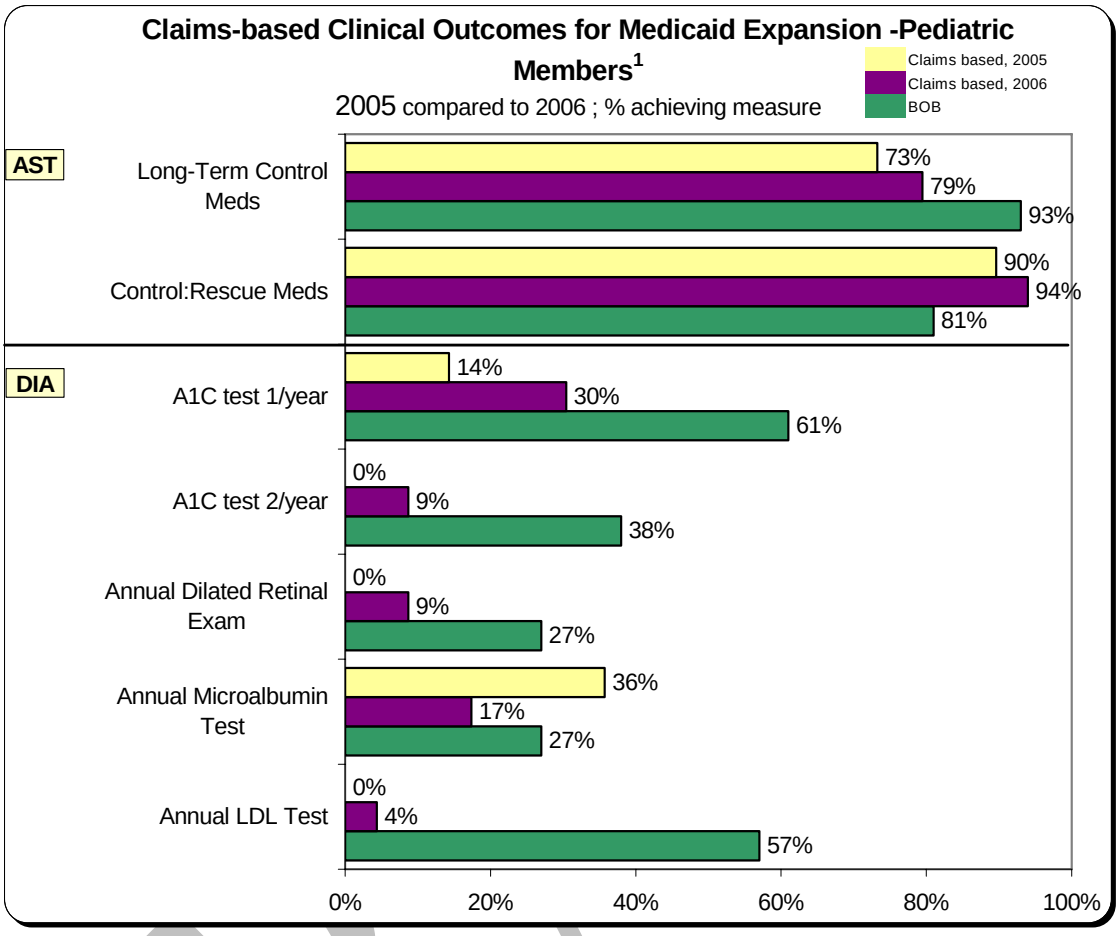
[1] Baseline expense has been trend-adjusted. Source: DMAS

DMAS Medicaid Expansion – Pediatrics

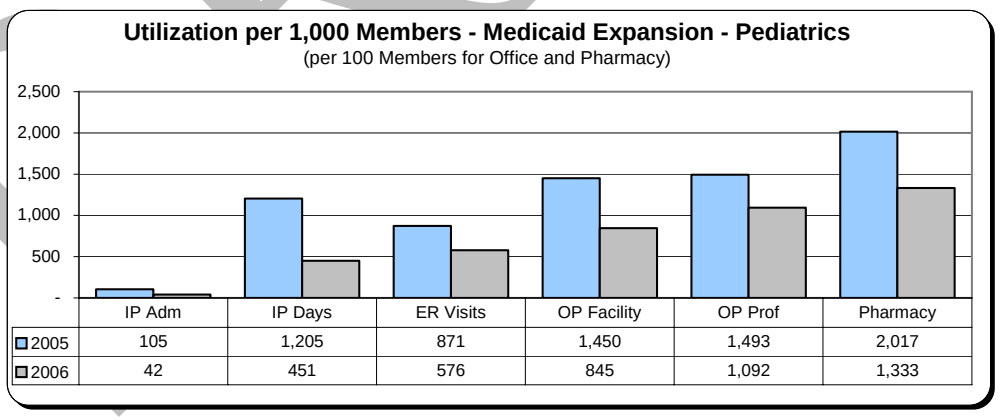


[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure.

The difference between the first and last measures for self-reported data is considered statistically significant at the 0.05 level using a two-tailed paired test.

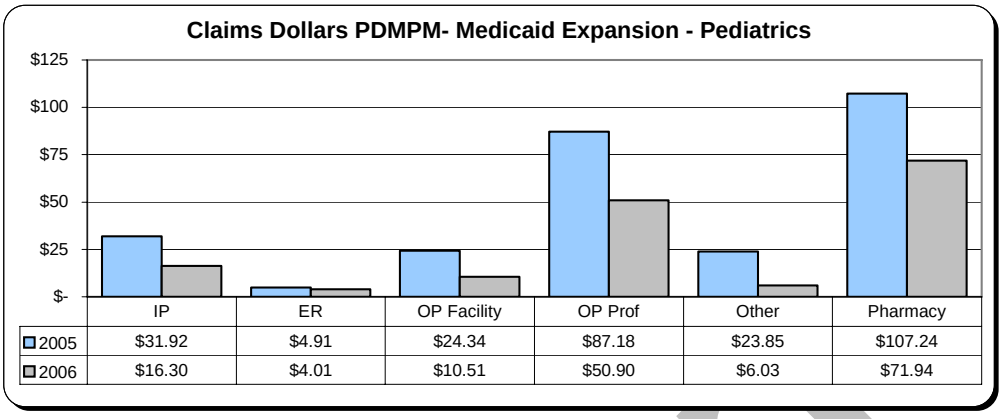


[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure. For claims-based measures, 2005 is compared to 2006.
*The difference between measures is considered statistically significant at the 0.05 level using a two-tailed paired test.



	IP Adm	IP Days	ER Visits	OP Facility	OP Prof	Pharmacy
2005	105	1,205	871	1,450	1,493	2,017
2006	42	451	576	845	1,092	1,333

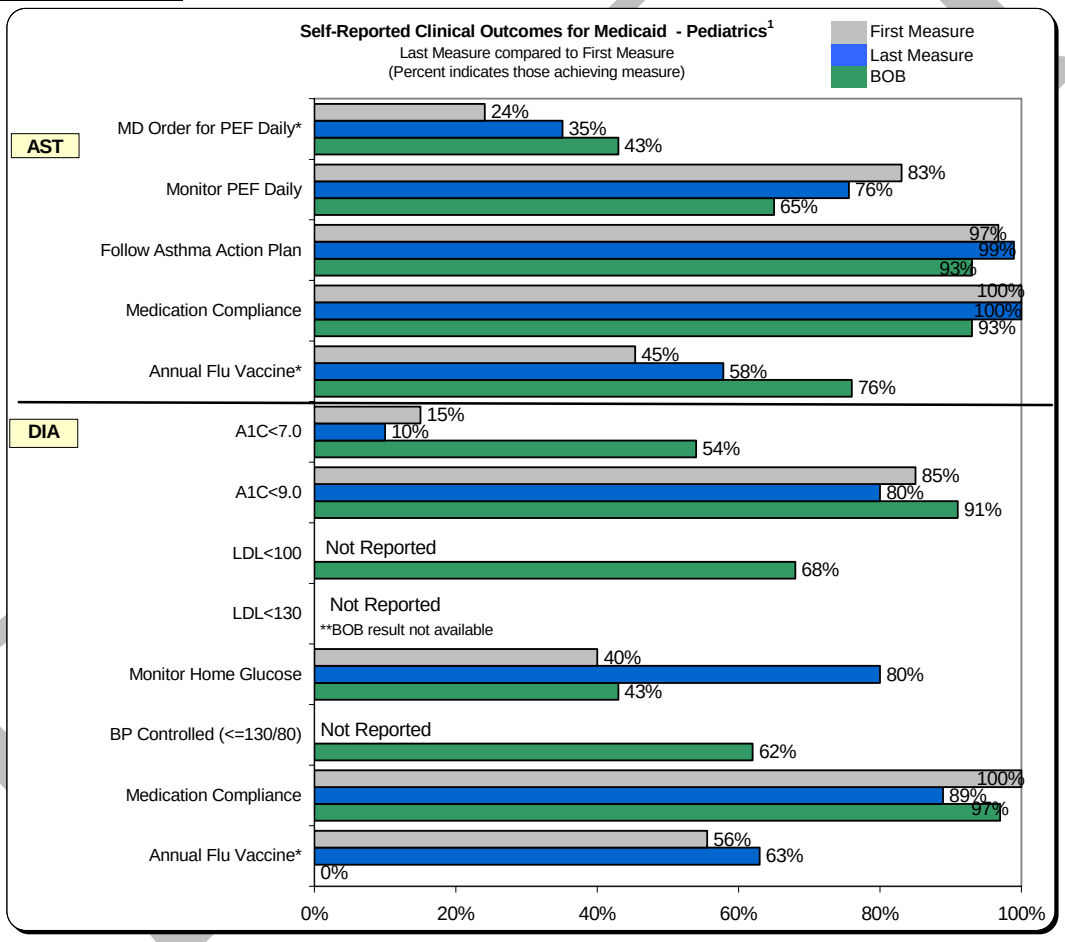
[1] Baseline utilization has been trend-adjusted. Source: DMAS



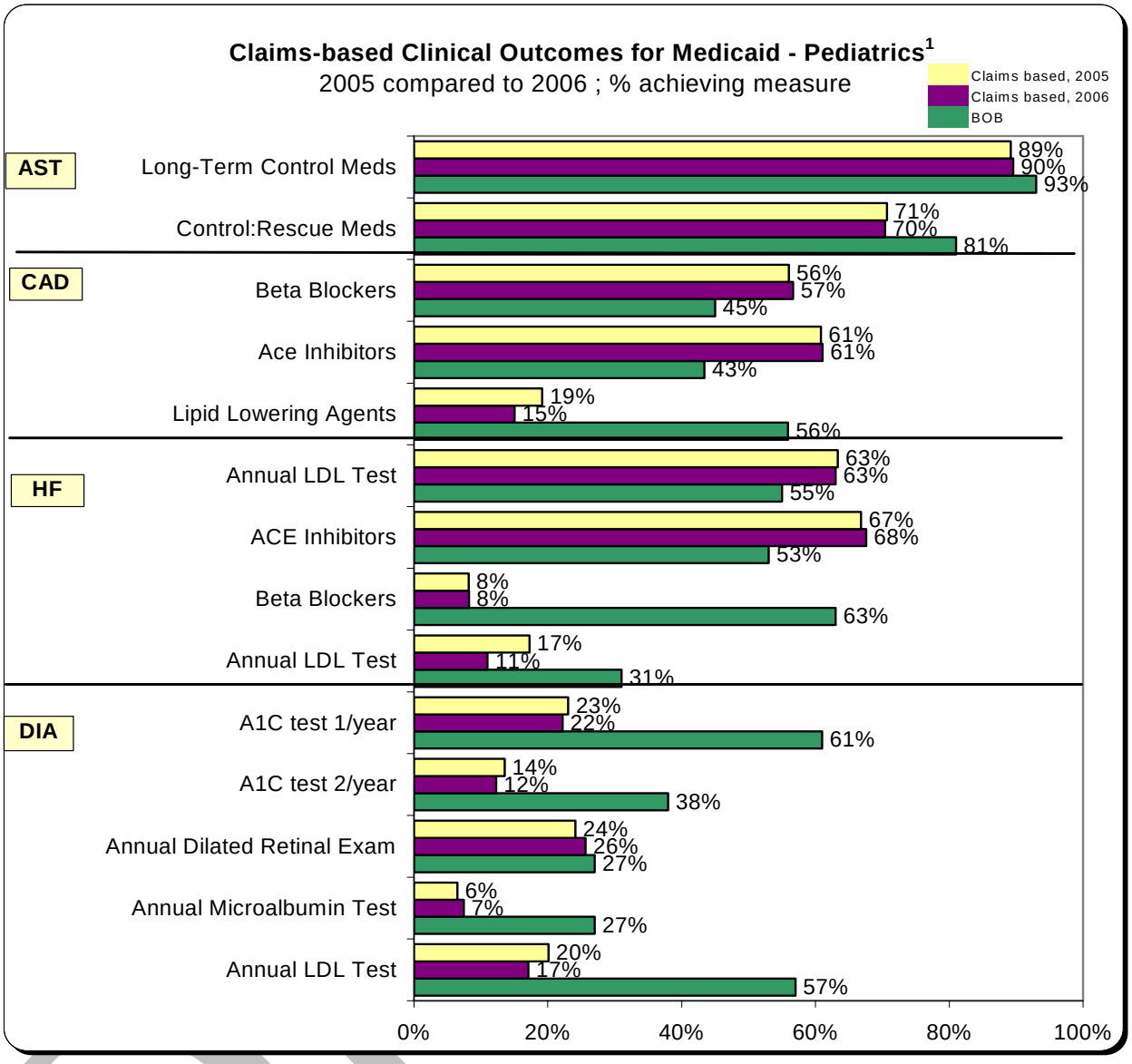
	IP	ER	OP Facility	OP Prof	Other	Pharmacy
2005	$31.92	$4.91	$24.34	$87.18	$23.85	$107.24
2006	$16.30	$4.01	$10.51	$50.90	$6.03	$71.94

[1] Baseline expense has been trend-adjusted. Source: DMAS

DMAS Medicaid – Pediatrics

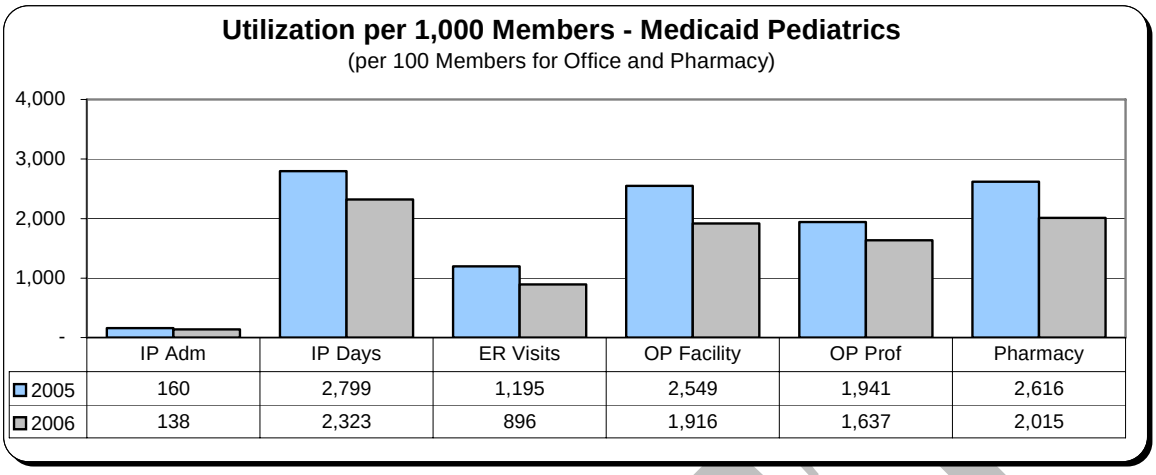


[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure.
For claims-based measures, 2005 is compared to 2006.
*The difference between measures is considered statistically significant at the 0.05 level using a two-tailed paired test.



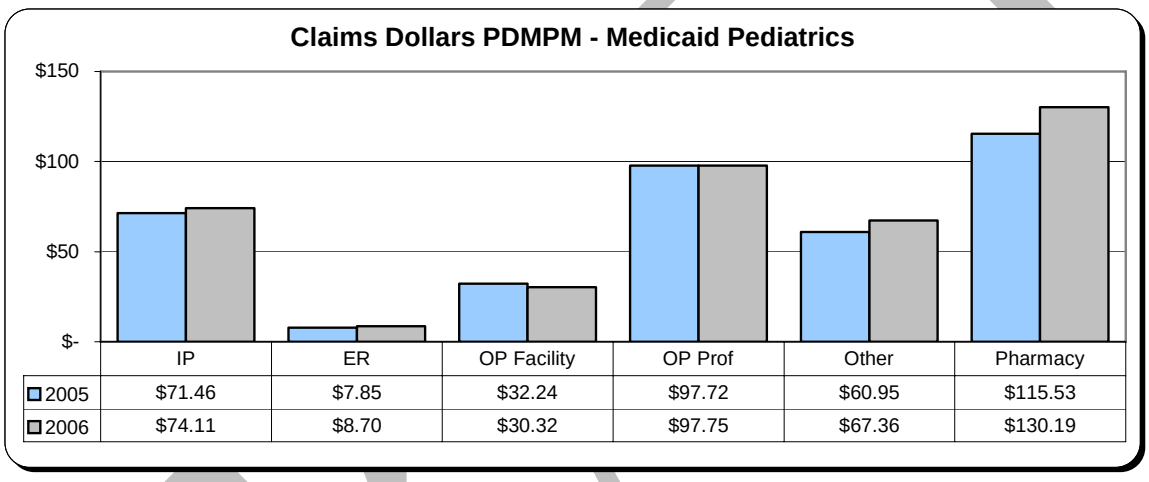
[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure. For claims-based measures, 2005 is compared to 2006.

*The difference between measures is considered statistically significant at the 0.05 level using a two-tailed paired test.



	IP Adm	IP Days	ER Visits	OP Facility	OP Prof	Pharmacy
2005	160	2,799	1,195	2,549	1,941	2,616
2006	138	2,323	896	1,916	1,637	2,015

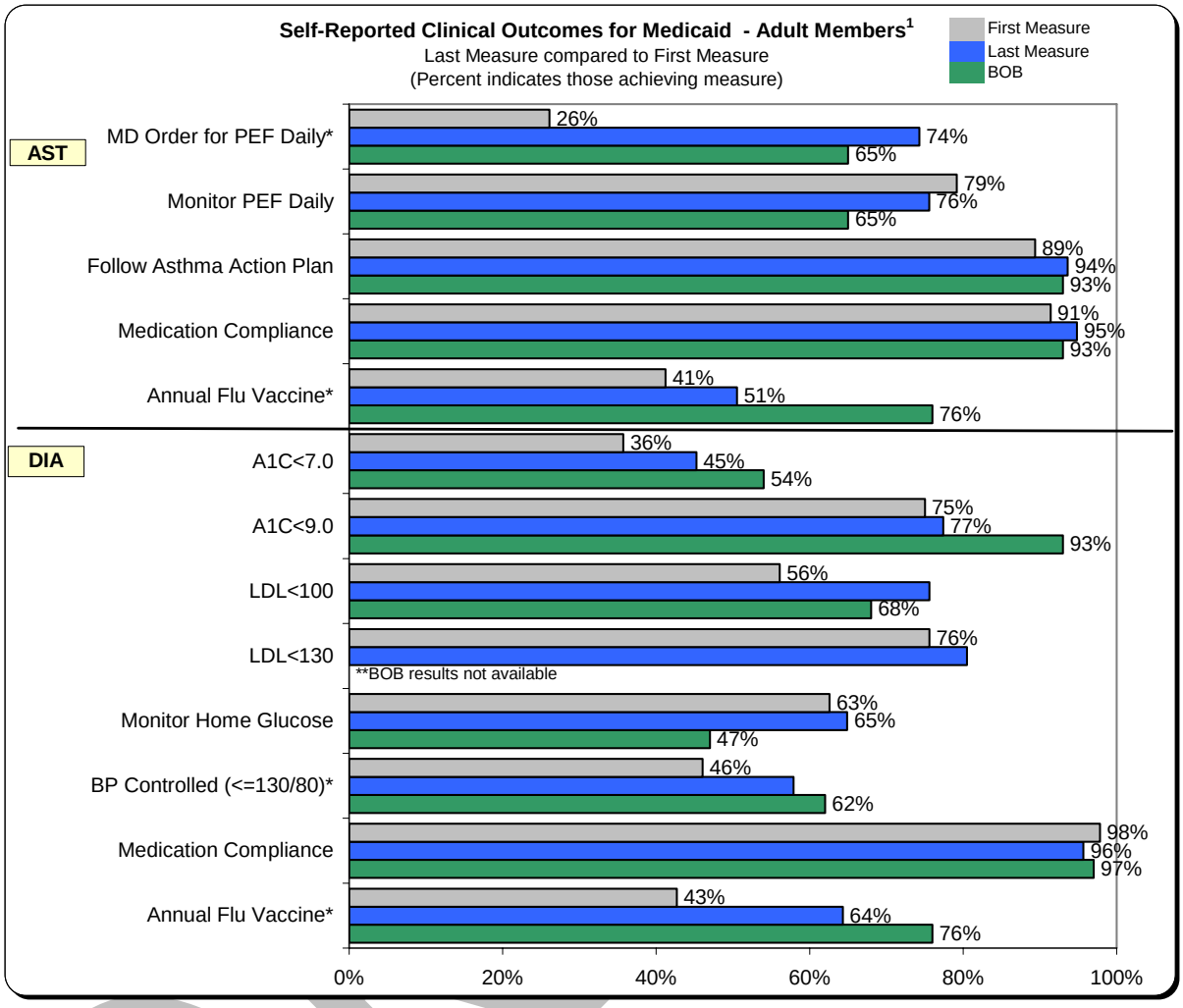
[1] Baseline utilization has been trend-adjusted. Source: DMAS



	IP	ER	OP Facility	OP Prof	Other	Pharmacy
2005	$71.46	$7.85	$32.24	$97.72	$60.95	$115.53
2006	$74.11	$8.70	$30.32	$97.75	$67.36	$130.19

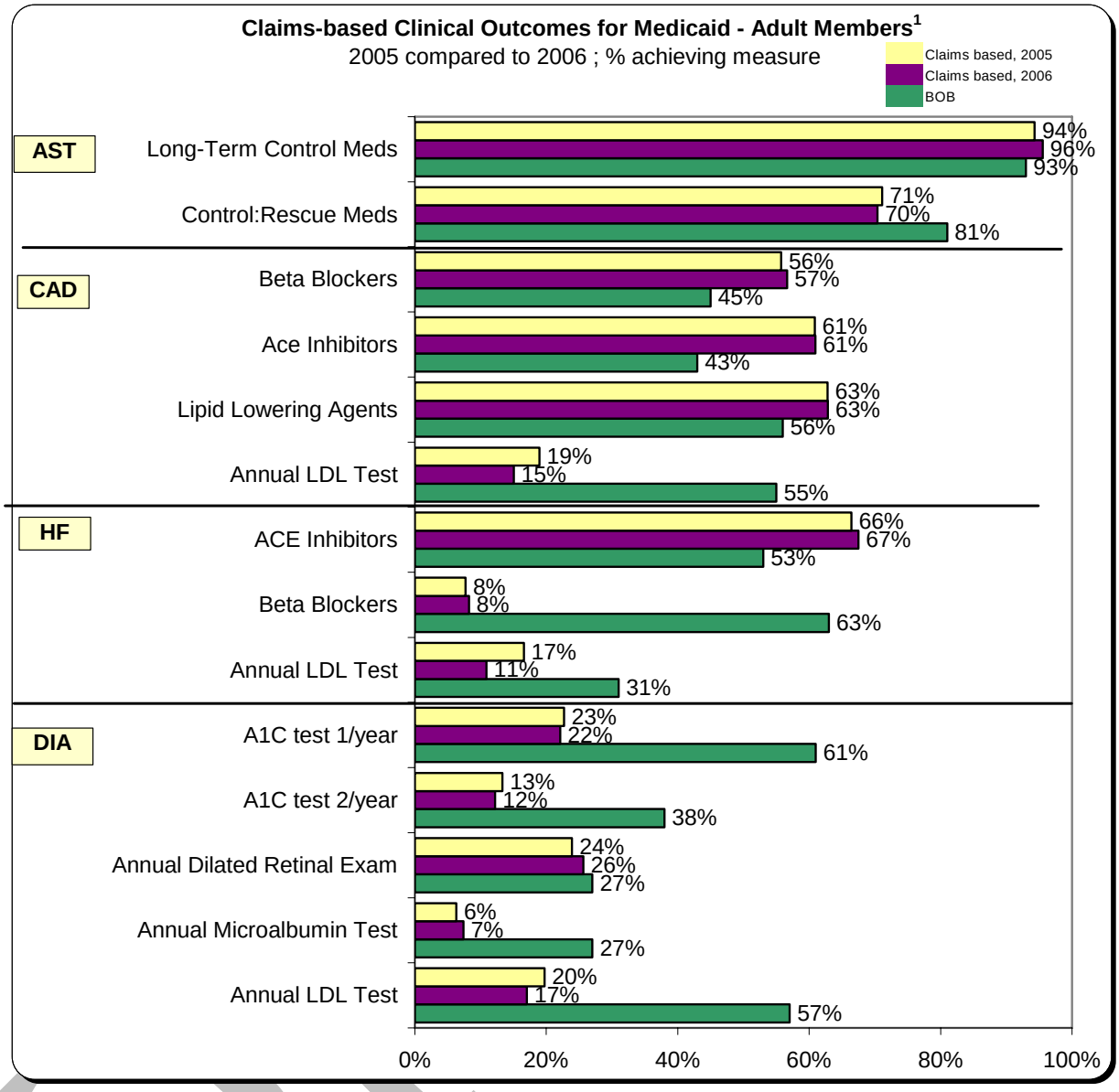
[1] Baseline expense has been trend-adjusted. Source: DMAS

DMAS Medicaid – Adults

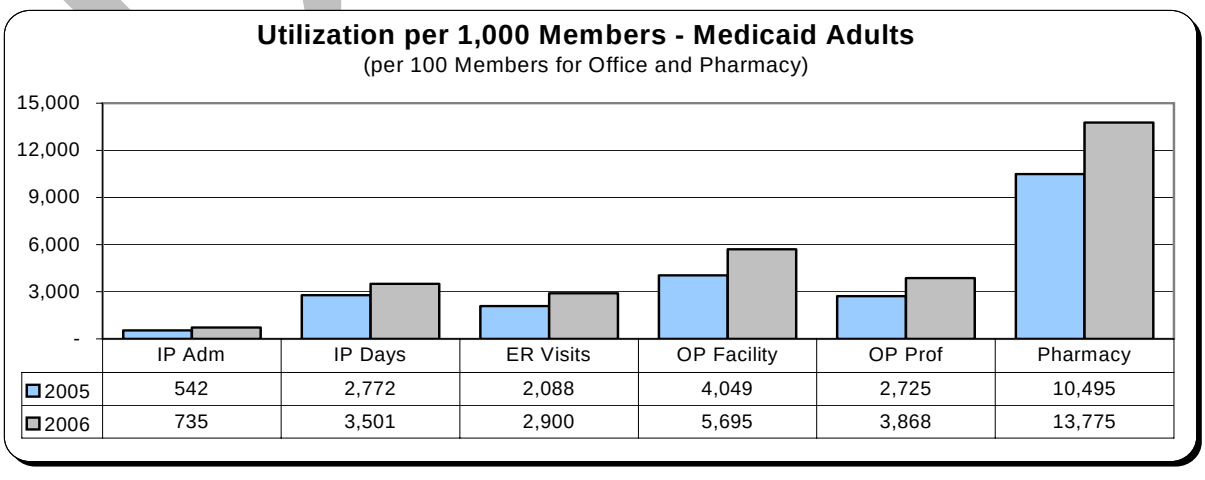


[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure. For claims-based measures, 2005 is compared to 2006.

*The difference between measures is considered statistically significant at the 0.05 level using a two-tailed paired test.

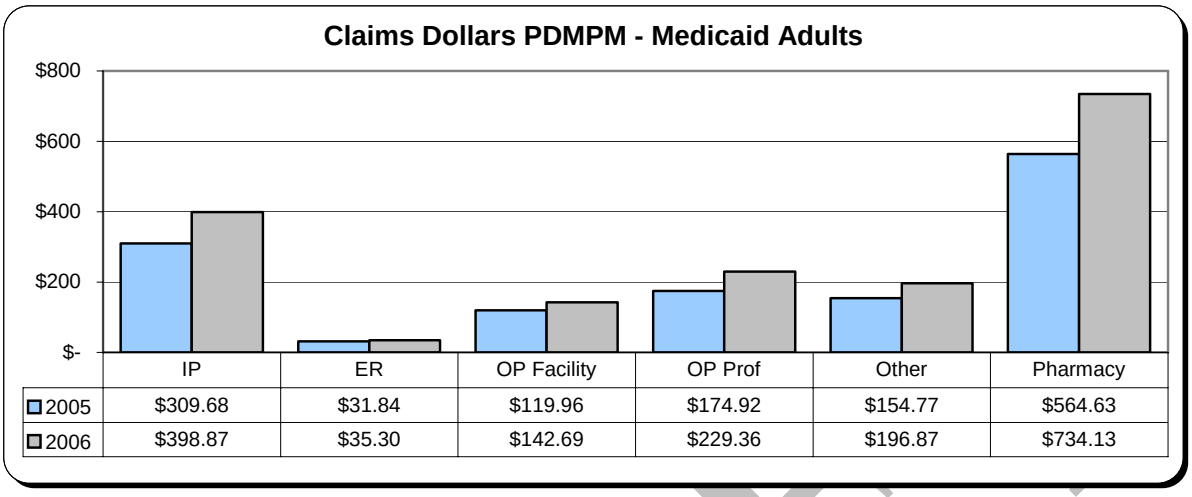


[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure. For claims-based measures, 2005 is compared to 2006.
*The difference between measures is considered statistically significant at the 0.05 level using a two-tailed paired test.



	IP Adm	IP Days	ER Visits	OP Facility	OP Prof	Pharmacy
2005	542	2,772	2,088	4,049	2,725	10,495
2006	735	3,501	2,900	5,695	3,868	13,775

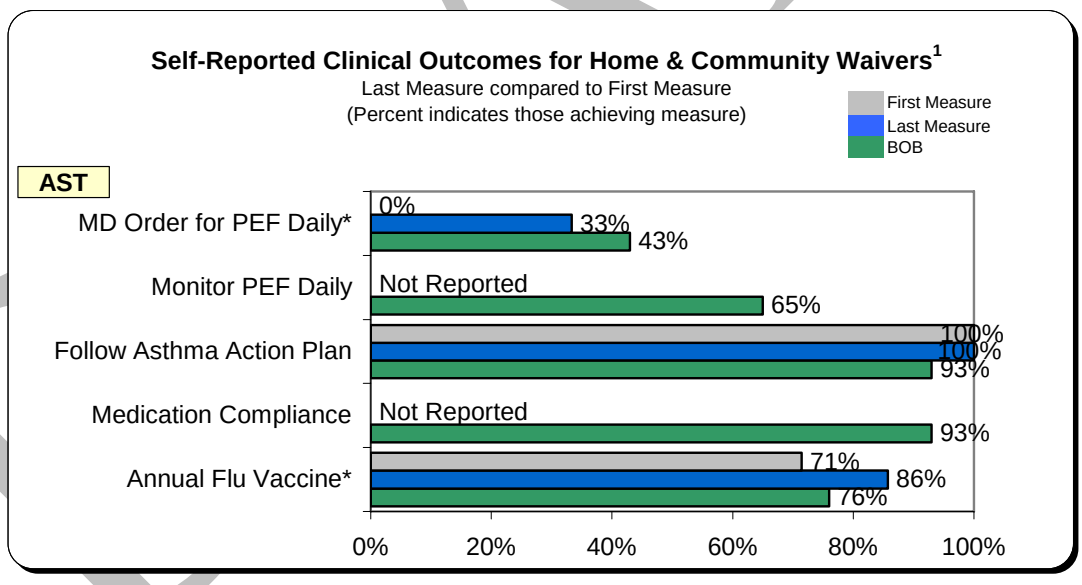
[1] Baseline utilization has been trend adjusted. Source: DMAS



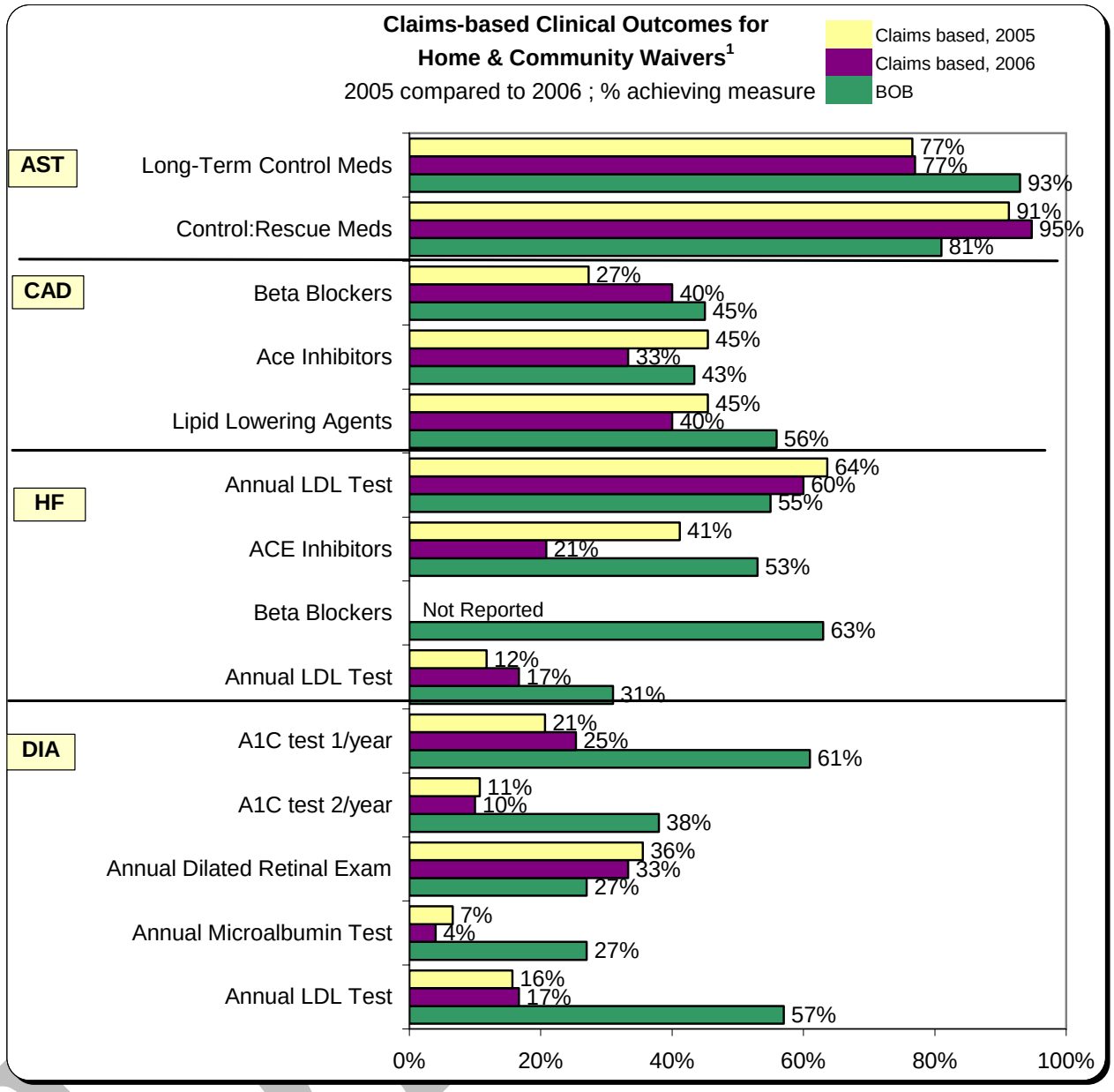
	IP	ER	OP Facility	OP Prof	Other	Pharmacy
2005	$309.68	$31.84	$119.96	$174.92	$154.77	$564.63
2006	$398.87	$35.30	$142.69	$229.36	$196.87	$734.13

[1] Baseline expense has been trend-adjusted. Source: DMAS

DMAS – Home and Community Based Waivers

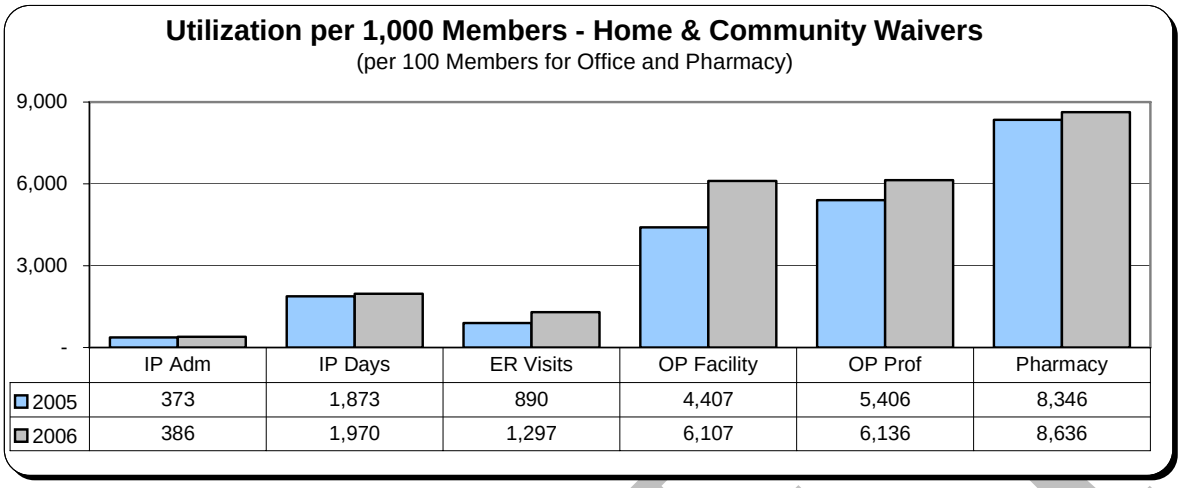


[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure. For claims-based measures, 2005 is compared to 2006.
*The difference between measures is considered statistically significant at the 0.05 level using a two-tailed paired test.



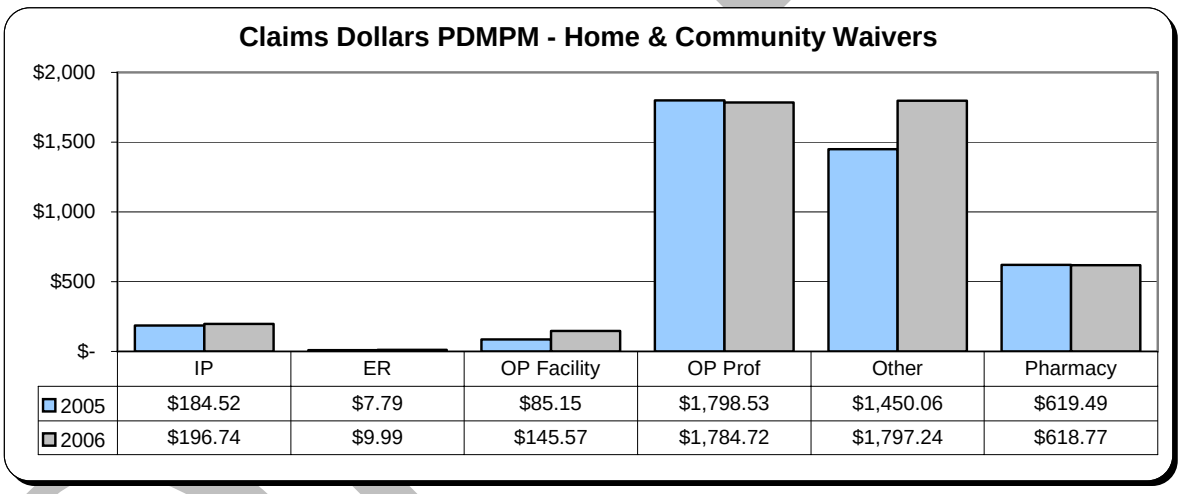
[1]For self-reported measures; the evaluation period is most recent assessment measure versus first assessment measure. For claims-based, BL is compared to Year 1.

*The difference between measures is considered statistically significant at the 0.05 level using a two-tailed paired test.



	IP Adm	IP Days	ER Visits	OP Facility	OP Prof	Pharmacy
2005	373	1,873	890	4,407	5,406	8,346
2006	386	1,970	1,297	6,107	6,136	8,636

[1] 2005 utilization has not been trend-adjusted.



	IP	ER	OP Facility	OP Prof	Other	Pharmacy
2005	$184.52	$7.79	$85.15	$1,798.53	$1,450.06	$619.49
2006	$196.74	$9.99	$145.57	$1,784.72	$1,797.24	$618.77

[1] 2005 expense has been trend-adjusted. Source: DMAS

Methodology

Report Population

In 2004, Virginia Department of Medical Assistance Services (DMAS) contracted with HMC to offer a pilot disease management program for a subset of eligible DMAS members identified with coronary artery disease or heart failure. After 12 months of program management, clinical and financial outcomes were reported to DMAS. Following the positive results of the cardiac pilot, DMAS expanded the pilot program in January 2006 to include disease management services for pediatric and adult members identified with asthma and diabetes.

- June 2004, first case load for DMAS members identified for cardiac pilot
- December 2004, last case load for cardiac pilot
- Approximately 2000 members identified for management
- May 2005, pilot program ended
- October 2005, clinical and financial results for cardiac pilot delivered
- January 2006, program expanded to include asthma and diabetes

Please note that some members originally managed as part of the cardiac pilot continue to receive management under the expanded program. Therefore this report does not represent a true pre-program/post-intervention evaluation for all identified members.

To determine the identifiable population, the most current HMC identification criteria for the managed conditions were applied retrospectively to each month of the evaluation periods. For example, claims from October 2003 through December 2004 were examined to determine who was identifiable in January 2005. This process was then repeated for each month in the evaluation years, and the monthly lists were combined for each year to define the population. It is important to note that since the most recent identification criteria were applied retrospectively for the entire report period, it is possible that members may be included in the report that were not identified for management at the time the claims were received.

Please note members with certain medical conditions were removed from this analysis. These medical conditions include non-skin cancers, ESRD, HIV, and transplants. In cases where members' total claims expense (medical and pharmacy) exceeded four standard deviations from the average total expense, the members were considered outliers and removed from the analyses.

Time Periods

This report includes a review of outcomes for members identified with a condition through December 31, 2006. For adult and pediatric Medicaid members, the evaluation periods for the report are:

- Period 1: January 1, 2005 through December 31, 2005
- Period 2: January 1, 2006 through December 31, 2006

Claims-Based Outcomes

Members with 12 member months with DMAS were included in the measurement of claims-based outcomes (e.g. a minimum enrollment of 12 months during the evaluation period). Since an annual test may be taken anytime during the year, with no enrollment criteria the results are likely to be skewed in either direction.

Numerators are calculated based on appropriately coded claims incurred during the period. Results for outcomes measures may be dissimilar to actual reported HEDIS results, as no chart review is included nor application of other special provisions allowed for in the HEDIS measurement guidelines.

Self-Reported Outcomes

Results are compared for the first measure and most recent measure collected on a DPP (dynamic patient profile) by the Nurse Consultants. The most recent measure must occur during the current evaluation period.

Book of Business Outcomes

Results are based on the entire Commercial book of business (BOB) receiving disease management services by HMC. The time period for BOB results is calendar year 2006. BOB results are not available for Medicaid members at this time. Please note the self-reported measure, LDL<130, is a new measure and BOB results are not yet available for this metric.

Statistical Significance Testing

Significance testing was completed on all claims-based and self-reported to determine if the change in outcome from 2005 to 2006 or from first to last assessment was significant. The test applied was a two-tailed z-test with a 95% confidence interval.

Trends/Completion Factors

Cost trends were originally supplied by DMAS. The resulting trend factors were 37% for medical expense and 39% for pharmacy expense. The high trends were discussed with DMAS to ensure the client was in agreement with the trend factors. DMAS received approval from their Budget Forecasting Office to use the trends factors in the annual evaluation noting that this population is a fee for service Medicaid population that include a significant number of disabled members. In addition, membership in DMAS fee for service plans have been decreasing over the past two years as groups move to managed care upon renewal, in an effort to control costs. Subsequently, PMPM costs are rising for groups within the fee for service plans. HMC will continue to work with DMAS to ensure the process for calculating trend factors and applying adjustments is complete and accurate.

For utilization and expense, 2005 expense has been trend-adjusted to allow for meaningful comparison of results using trend factors supplied by DMAS. Completion factors were not necessary since six months of claims run out was allowed in each time period and claims processing is considered complete.

Medical Cost Trend: 37.1%
Medical Utilization Trend: 22.9%
Pharmacy Cost Trend: 39.5%
Pharmacy Utilization Trend: 31.8%

Savings Calculation

The incident-prevalent methodology is used to calculate the incremental savings year over year. In this methodology, members are divided into one of two groups: incident and prevalent. The prevalent population is comprised of those members identifiable with a condition in the first month of the evaluation year. In contrast, the incident population is comprised of those members who are not identifiable in the first month of the evaluation year but are identifiable in later months. Expense is weighted based on the membership in the most recent period. The term incremental savings is used rather than return on investment because Period 1 (2005) is not a true pre-intervention time period due to the exposure of the population to services as part of the cardiac pilot.

Operations Glossary

Active Case: A case in which the member receives some level of management, i.e., has a status of either Open or On Demand.

Aggregate Total Identified: Total cases identified, whether they are currently under management or closed.

Case Status:

Open: Identified cases that are under management, or that are in the process of being contacted.

Closed: Cases that are no longer under management, either by patient request or due to loss of eligibility. Closure reasons are logged and reported on.

On Demand High Intensity: The individual was contacted and decided against taking phone calls, or HMC was not able to establish contact, or lost contact, with the individual. The member still receives mailings.

Commercial Book of Business Clinical Outcomes: Clinical outcomes for current non-Medicaid populations managed by Health Management Corporation. Methodology for commercial reference outcomes is consistent with the methodology applied to DMAS. A minimum member month criterion is applied.

Comorbidities: Medical conditions other than the primary managed conditions experienced by members participating in the program.

Dynamic Patient Profile (DPP): Based on established clinical practice guidelines, tool used to classify a member's level of severity and control of their condition.

Education Packets: Condition-specific information sent to program participants listing condition signs, symptoms, triggers and trigger avoidance plans.

Eligible Members: Members for whom the disease management benefit is available.

Focused Intervention Plan: A plan developed and used by the nurse to help the member reach his/her goals. It takes into account clinical data, barriers to compliance, readiness for change, and current health status.

Graduate: High Intensity members who meet all of their clinical goals are moved to a Standard Intensity status.

High Intensity: Members considered the most likely to incur high healthcare expenses in the future. They may be assigned either at the time the case is created, or based on criteria evaluated by the care manager. They receive regular follow-up calls, an individualized plan of care based on their assessment, 24-hour access to program nurses, and quarterly condition-specific information.

Identification Rate: Rate derived by dividing the number of non-closed cases by the current eligible membership.

Identified Members: Members for whom a DM case is created out of total members eligible for the DM program.

Inbound Call: A phone call from either the member or another party regarding the member's case.

Non-Compliance Issue Alert: A system-generated alert for Nurse Consultant action based on claims and self-reported medication information.

Outbound Call: A phone call to either the member or another party regarding the member's case.

Outpatient Facility Claims Expense: Facility-related expense for diagnostic and therapeutic services received in an outpatient setting for those who do not require hospitalization. Places of treatment include the hospital outpatient facility, ambulatory care center, etc.

Outpatient Professional Claims Expense: Expense attributed to services administered by a provider/clinician and related diagnostic/therapeutic services provided in an outpatient setting.

Physician Alert: A system-generated alert to the physician based on changes in the member's health status.

Primary Condition: The managed condition identified as having the highest impact on the member's quality of life. This may differ from the condition for which the member was referred.

Provider Communication: After a high intensity member completes the Dynamic Patient Profile and consents to the release of a notification letter, this is sent to their physician. Notification letter details the Program goals and elicits provider collaboration.

Provider Questionnaire: Questionnaire to gather more specific detail on member status and current barriers to improvement. It is mailed to the member, who is encouraged to have their provider complete and return it.

Reference Medicaid Population: The reference group is an urban, Medicaid population currently managed by HMC. The group is larger in size than DMAS but the most comparable reference group within our client base. Methodology applied for calculating clinical outcomes is consistent with methodology for DMAS.

Referral: High intensity members may receive referrals for resources such as a physician specialist, dietitian or home health care agency.

Refused All Contact: Member has refused program participation at all levels, including phone calls and mailings, resulting in case closure.

SF-8: A nationally recognized tool used to measure high intensity members' self-perception of their physical and mental health status. An initial SF-8 is typically completed at the same time as the Dynamic Patient Profile, and again every 12 months thereafter.

Standard Intensity: Members considered at standard risk for future healthcare expense; able to manage their condition with limited external support. They receive a mail-in assessment, educational materials, quarterly disease-specific information, and 24-hour access to program nurses.

Stratification: Predictive method used to classify identified members for the appropriate level of intervention, either high intensity or standard intensity.

Closed: All identified cases that have been closed.

Under Management: All current open or on demand high and standard intensity cases.

Clinical Glossary

ACE Inhibitors:	ACE = Angiotensin Converting Enzyme; ACE Inhibitors are medications that lower blood pressure and reduce the strain on the heart. They are often recommended for persons with CAD, CHF and diabetes to reduce the risk of cardiovascular complications.
Asthma Action Plan:	An asthma action plan is developed by a person's provider, and will tell a person with asthma what medications they should take and other activities they should do to keep their asthma under control.
A1C:	A1C is a diabetes test that measures a person's average blood glucose level over the past 2 to 3 months. Also called hemoglobin A1C or glycosylated hemoglobin, the test shows the amount of glucose that sticks to the red blood cell, which is proportional to the amount of glucose in the blood. Currently, the American Diabetes Association recommends that A1C levels be tested regularly and in general should be below 7 for people with diabetes (although depending on a person's status and other risk factors, the goal A1C may be modified).
Anti-platelet Therapy:	Anti-platelet medications stop platelets from clumping together to form clots. Platelets are small blood cell fragments that are made in the bone marrow. Platelets circulate through blood vessels and help stop bleeding by sticking together to seal small cuts or breaks in tiny blood vessels. For persons with CAD, anti-platelet medication or aspirin (see below) is often recommended to decrease the risk of cardiovascular complications.
ASA:	ASA = Aspirin; Aspirin is part of the drug class called "salicylates", which can prevent blood clots from forming in the body by stopping the clumping of platelets.
Asthma:	Asthma is a chronic disease that affects the airways, which are the tubes that carry air in and out of the lungs. With asthma, the inside walls of the airways are inflamed (swollen). This makes the airways very sensitive, and they tend to react strongly to things which a person is allergic to or finds irritating. When the airways react, they get narrower and less air flows through to the lung tissues. This causes symptoms like wheezing, coughing, chest tightness, and trouble breathing.
Beta Blockers:	A class of medications that slow the heart rate and lower blood pressure to decrease the workload on the heart. Beta blockers are recommended for many people with CAD or CHF to decrease the risk of cardiovascular complications.
Blood Pressure:	Blood is carried from the heart to all parts of your body in vessels called arteries. Blood pressure is the force of the blood pushing against the walls of the arteries. For people with certain chronic conditions, such as CAD, CHF, and diabetes, it is recommended that the blood pressure be maintained at or below certain levels to reduce the risk for various complications.

Bronchodilators:	Bronchodilators are medications that dilate or open up the airways, and are used in the treatment COPD. Two classes of bronchodilators used in the treatment of COPD are beta-adrenergic medications and anticholinergic medications.
Congestive Heart Failure:	Congestive Heart Failure (CHF) is a condition where the heart cannot pump enough blood throughout the body. Heart failure develops over time as the pumping action of the heart grows weaker.
Coronary Artery Disease:	Coronary Artery Disease (CAD) occurs when the arteries that supply blood to the heart muscle become hardened and narrowed due to the buildup of plaque on the inner walls or lining of the arteries (atherosclerosis). As the arteries narrow, the blood flow, and thus the oxygen supply, to the heart muscle, is reduced, increasing the risk of a heart attack. CAD is the most common type of heart disease and the leading cause of death in the U.S. in both men and women.
Diabetes:	Diabetes is a disease in which the body does not produce or properly use insulin. Insulin is a hormone that is needed to convert sugar, starches and other food into energy needed for daily life.
Dilated Retinal Eye Exams:	A dilated retinal eye exam (DRE) is a test done by an eye care specialist in which the pupil (the black center) of the eye is temporarily enlarged with eye drops to allow the specialist to see the inside of the eye more easily. Retina: the light-sensitive layer of tissue that lines the back of the eye. DREs are recommended annually for persons with diabetes in order to detect and prevent diabetes-related complications in the eyes that often lead to loss of vision.
Home Glucose Monitoring:	Blood glucose: the main sugar found in the blood and the body's main source of energy. Also called blood sugar. Blood glucose monitoring: checking blood glucose level on a regular basis in order to manage diabetes. The frequency of blood glucose monitoring is usually determined by a provider based on the person's disease type and severity.
Influenza (Flu) Vaccination:	Influenza: Influenza, "the flu", is a contagious respiratory illness caused by influenza viruses. These viruses can cause mild to severe illness. Some people, such as older people, young children, and people with certain health conditions, are at high risk for serious complications if they develop the flu. Influenza vaccination: The best way to prevent influenza is by having a flu vaccination each fall. Within about two weeks after vaccination, vaccine recipients develop antibodies that work to protect against influenza virus infection.
Lipid Testing /Lipid Profile:	Lipid: a term for fat in the body. Lipids can be broken down by the body and used for energy. Lipid Profile: blood test that measures total cholesterol, triglycerides, and HDL cholesterol (which is often called "good" cholesterol). LDL cholesterol (sometimes called "bad" cholesterol) is then calculated from the results. Goal LDL levels are determined by a person's cardiac status and other risk factors.
Lipid Lowering Medications:	A class of medications that lower lipid levels. Lipid lowering medications are recommended for many people with CAD to decrease the risk of cardiovascular complications.

Long-Term Control Medications: In many people with asthma, long-term control medicines are prescribed to be taken every day, usually over long periods of time, to control chronic symptoms and to prevent asthma attacks.

Microalbumin Testing: Microalbuminuria is the presence of small amounts of albumin, a protein, in the urine. Microalbuminuria is an early sign of kidney damage, or nephropathy, a common and serious complication of diabetes. Annual screening for microalbuminuria is recommended in persons with diabetes.

Peak Expiratory Flow Rate (PEF):The peak expiratory flow rate measures how fast a person can exhale air and is one of many tests that measure the function of the airways. The severity of asthma can change with time, and peak expiratory flow monitoring is used by many patients to monitor their lung function at home. This allows them to anticipate when their breathing will become worse and to take appropriate medications or call their provider before symptoms become too severe.

Peak Flow Meters: Measuring the Peak Expiratory Flow (PEF) rate requires a peak expiratory flow monitor, small hand-held device with a mouthpiece at one end and a scale with a moveable indicator.

Ratio of Control to Rescue Medications: In many people with asthma, long-term control medicines are prescribed to be taken every day, usually over long periods of time, to control chronic symptoms and to prevent asthma attacks. Rescue medicines are part of a group of medicines called "quick relief medicines", which provide rapid, short-term treatment and are taken when worsening asthma symptoms occur. In many people with asthma, ongoing asthma treatment per the provider's care plan includes consistent usage of control medications, and this may lead to a reduction in the need for quick relief medicines.

Short-Acting Beta-Agonists: Short-Acting Beta-Agonists (SABA) are part of a group of medicines called "quick relief medicines". In people with asthma, Short-Acting Beta-Agonists provide rapid, short-term treatment and are taken when worsening asthma symptoms occur. In many people with asthma, ongoing asthma treatment per the provider's care plan leads to a reduction in the need for quick relief medicines.

Sodium Restricted Diet: Most sodium is consumed in the form of sodium chloride, which is table salt. For someone with high blood pressure or CHF, a provider may advise eating less salt and sodium than is recommended for people with normal blood pressure, in order to reduce complications associated with these conditions.

Satisfaction Survey Results

numerator = 163 Response Rate:
denominator = 782 20.84%

1. I heard about the Care Management Program through

(Check all that apply):	Number	Percent
Heard about the program through telephone	112	68.71%
Heard about the program through benefits package	19	11.66%
Heard about the program through home mailings	54	33.13%
Heard about the program through doctor/doctors staff	10	6.13%
Heard about the program through family member/friend	5	3.07%
Heard about the program through employer letter	2	1.23%
Heard about the program through other	6	3.68%

2. About how many times have you spoken with a nurse?

	Number	Percent
1 to 2	5	3.07%
3 to 6	30	18.4%
7 to 9	29	17.79%
10 to 12	31	19.02%
More than 12	60	36.81%

3. Please rate the Care Management Program nurses on the following measures:

Knowledge of my health condition	Number	Percent
Excellent	117	72.22%
Very Good	32	19.75%
Good	9	5.56%
Fair	3	1.85%
Poor	1	0.62%
No Response	1	

Professionalism	Number	Percent
Excellent	114	78.62%
Very Good	21	14.48%
Good	6	4.14%
Fair	2	1.38%
Poor	2	1.38%
No Response	18	

Accessibility	Number	Percent
Excellent	100	68.97%
Very Good	29	20.0%
Good	10	6.9%
Fair	5	3.45%
Poor	1	0.69%
No Response	18	

4. Please rate the quality of the enclosed educational materials on the following measures:

Content of the materials	Number	Percent
Excellent	89	58.94%
Very Good	46	30.46%
Good	11	7.28%
Fair	5	3.31%
Poor	0	0.0%
No Response	12	

Ease of understanding the materials	Number	Percent
Excellent	84	60.0%
Very Good	37	26.43%
Good	13	9.29%
Fair	6	4.29%
Poor	0	0.0%
No Response	23	

Usefulness of the materials	Number	Percent
Excellent	83	59.71%
Very Good	38	27.34%
Good	11	7.91%
Fair	7	5.04%
Poor	0	0.0%
No Response	24	

5. If your experience with the Care Management Program caused you to make any changes in your health management or status, check all that apply.

Accessibility	Number	Percent
knowledge of my health condition?	117	71.78%
monitor my health condition more closely?	120	73.62%
proper use of medication?	79	48.47%
change in my physical activity/exercise?	61	37.42%
improved eating habits?	82	50.31%
quit/reduced smoking?	48	29.45%
weight management/weight loss?	75	46.01%
other?	7	4.29%

6. Do you feel you now have better control over your health/condition as a result of being in the program?

	Number	Percent
Yes	110	69.18%
No	2	1.26%
Somewhat	36	22.64%
A little bit	11	6.92%
No Response	4	

7. How would you rate the program?

	Number	Percent
Excellent	99	61.49%
Very Good	42	26.09%
Good	14	8.7%
Fair	5	3.11%
Poor	1	0.62%
No Response	2	

8. Would you recommend the Care Management Program to others?

	Number	Percent
Yes	156	98.11%
No	3	1.89%
No Response	4	

DATA TABLES

Virginia Department of Medical Assistance Services Outcomes Detail

Condition / Measure	Review Period	Number Reviewed[1]	Number Achieving Goal	Percentage Achieving Goal	Relative % Change[2]	Absolute % Change[2]	HMC Book of Business (2006)	Data Source[3]
ASTHMA								
Long Term Control Medications (Persistent Asthmatics)*	2005	2,779	2,500	90%				Claims
	2006	3,648	3,344	92%	2%	2%	93%	
Control Medications : Rescue Medications[4]*	2005	9,169	6,453	70%				Claims
	2006	11,879	8,512	72%	2%	1%	81%	
% with an MD Order for PEF Monitoring[5]*	First	362	84	23%				DPP
	Last	362	127	35%	51%	12%	43%	
% Adherent with MD Order for PEF monitoring[5]	First	84	67	80%				DPP
	Last	127	92	72%	-9%	-7%	65%	
Follow Asthma Action Plan	First	156	145	93%				DPP
	Last	156	151	97%	4%	4%	98%	
Annual Flu Vaccine*	First	484	217	45%				DPP
	Last	484	269	56%	24%	11%	76%	
Medication Compliance	First	103	98	95%				DPP
	Last	103	98	95%	0%	0%	93%	

Virginia Department of Medical Assistance Services Outcomes Detail

CAD								
Beta Blockers	2005	1,913	1,056	55%				Claims
	2006	2,084	1,173	56%	2%	1%	45%	
ACE Inhibitors	2005	1,913	1,165	61%				Claims
	2006	2,084	1,261	61%	-1%	0%	43%	
Lipid Lowering Agents	2005	1,913	1,192	62%				Claims
	2006	2,084	1,303	63%	0%	0%	56%	
Annual LDL or Lipid Test*	2005	1,913	364	19%				Claims
	2006	2,084	316	15%	-20%	-4%	55%	
LDL < 100	First	26	13	50%				DPP
	Last	26	18	69%	38%	19%	79%	
LDL < 130	First	26	21	81%				DPP
	Last	26	24	92%	14%	12%	93%	
Blood Pressure Controlled	First	67	54	81%				DPP
(<140/90)	Last	67	59	88%	9%	7%	91%	
Daily ASA Therapy*	First	58	0	0%				DPP
	Last	58	14	24%	100%	24%	72%	
Annual Flu Vaccine	First	60	36	60%				DPP
	Last	60	41	68%	14%	8%	60%	
Comorbid of Diabetes:	First	11	9	82%				DPP
A1C < 7.0	Last	11	8	73%	-11%	-9%	61%	
CHF								
ACE Inhibitors or ARBs	2005	1,033	684	66%				Claims
	2006	1,085	720	66%	0%	0%	53%	
Beta Blockers	2005	133	77	58%				Claims
	2006	139	86	62%	7%	4%	63%	
Annual LDL or Lipid Test*	2005	1,033	166	16%			-	Claims
	2006	1,085	120	11%	-31%	-5%	31%	
Monitor Weight Daily (NYHA	First	40	7	18%				DPP
Classes II - IV)	Last	40	7	18%	0%	0%	31%	
Blood Pressure Controlled	First	47	31	66%				DPP
(<130/85)*	Last	47	30	64%	-3%	-2%	74%	
Adhere to Sodium-Restricted	First	42	37	88%				DPP
Diet	Last	42	38	90%	3%	2%	94%	
Annual Flu Vaccine	First	54	23	43%				DPP
	Last	54	28	52%	22%	9%	60%	

Virginia Department of Medical Assistance Services Outcomes Detail

DIABETES								
A1C Test Once Per Year	2005	4,009	884	22%				Claims
	2006	4,506	978	22%	-2%	0%	61%	
A1C Test Twice Per Year	2005	4,009	509	13%				Claims
	2006	4,506	528	12%	-8%	-1%	38%	
Annual Retinal Eye Exam	2005	4,009	988	25%				Claims
	2006	4,506	1,178	26%	6%	1%	27%	
Annual Microalbumin Test	2005	4,009	249	6%				Claims
	2006	4,506	314	7%	12%	1%	27%	
Annual LDL or Lipid Test*	2005	4,009	754	19%				Claims
	2006	4,506	715	16%	-16%	-3%	57%	
A1C < 7.0	First	110	35	32%				DPP
	Last	110	46	42%	31%	10%	54%	
A1C < 9.0	First	110	86	78%				DPP
	Last	110	85	77%	-1%	-1%	91%	
LDL<100	First	44	19	43%				DPP
	Last	44	23	52%	21%	9%	79%	
LDL < 130	First	44	34	77%				DPP
	Last	44	35	80%	3%	2%	93%	
Monitor Home Glucose	First	154	90	58%				DPP
	Last	154	105	68%	17%	10%	43%	
Blood Pressure Controlled (<130/80)*	First	150	69	46%				DPP
	Last	150	87	58%	26%	12%	62%	
Medication Compliance	First	52	51	98%			-	DPP
	Last	52	49	94%	-4%	-4%	97%	
Annual Flu Vaccine*	First	213	96	45%				DPP
	Last	213	132	62%	38%	17%	70%	

[1] Number Reviewed: For self-reported measures on the Dynamic Patient Profile (DPP), the "first" and "last" number responding includes high-intensity members who completed two or more assessments. The "all" number includes all those with at least one response on an assessment. This includes only known answers. For claims-based measures, the number reviewed includes all members with the condition and includes those who were continuously enrolled during the review period, based on available member month data.

[2] Percent change for claims-based measures compare to 2003. An absolute change is defined as the 2005 outcome minus the 2003 outcome. A relative change is the percent change between 2003 and 2005. Relative changes are addressed throughout the report.

[3] Data Source:
DPP = Dynamic Patient Profile (self-reported information)
Claims = Medical and/or Pharmacy claims data
DPP/Claims = Outcomes based on claims data, but severity level from self-reported DPP

[4] In an effort to improve our outcomes reporting, we have moved to reporting the ratio of control medications to rescue medications (control / (control+rescue)) as opposed to reporting only short-acting bronchodilator medications. This change allows us to report positive improvement for the combination of these important asthma drug categories versus looking at them independently.

[5] HMC has enhanced the definition for peak flow monitoring due to the fact that clinically, many physicians do not order peak flow monitoring, particularly daily monitoring, for their patients, and patients typically need a prescription from their physician to obtain reimbursement for a peak flow monitor. The new measures count the members with an order to monitor their peak flow daily and then count which of those members with an order are adherent.

***The difference between the first and last measures for self-reported data is considered statistically significant at the 0.05 level using a two tailed paired test. Statistical comparisons between claims based outcomes cannot be made due to the fact that the baseline and evaluation populations are partially overlapping.**

Note: Performance for DPP outcomes measures may decline at last measure due to program enhancements, which resulted in changes in data collection and/or more strict criteria.

Table 1: Utilization – Aggregate Population

All - Condition-Specific					All - Non Condition-Specific					All - TOTAL				
Claims setting	Time	Units / 1000	Change from 2005	% Change from 2005	Claims setting	Time	Units / 1000	Change from 2005	% Change from 2005	Claims setting	Time	Units / 1000	Change from 2005	% Change from 2005
IP Admits	2005	96.2			IP Admits	2005	266.3			IP Admits	2005	362.5		
	2006	77.4	-18.8	-19.5%		2006	243.8	-22.5	-8.4%		2006	321.2	-41.3	-11.4%
IP Days	2005	384.2			IP Days	2005	2,335.7			IP Days	2005	2,719.9		
	2006	277.8	-106.5	-27.7%		2006	2,245.1	-90.6	-3.9%		2006	2,522.9	-197.0	-7.2%
ER	2005	195.4			ER	2005	1,463.9			ER	2005	1,659.3		
	2006	166.2	-29.2	-14.9%		2006	1,345.2	-118.6	-8.1%		2006	1,511.4	-147.8	-8.9%
OP Fac	2005	298.4			OP Fac	2005	3,000.4			OP Fac	2005	3,298.7		
	2006	251.8	-46.5	-15.6%		2006	2,809.3	-191.1	-6.4%		2006	3,061.1	-237.6	-7.2%
OP Prof Fac	2005	280.0			OP Prof Fac	2005	2,061.5			OP Prof Fac	2005	2,341.5		
	2006	259.7	-20.3	-7.2%		2006	2,065.1	3.7	0.2%		2006	2,324.9	-16.6	-0.7%
Pharm	2005	1,741.5			Pharm	2005	5,018.0			Pharm	2005	6,759.5		
	2006	1,483.7	-257.8	-14.8%		2006	4,250.8	-767.2	-15.3%		2006	5,734.5	-1025.0	-15.2%
Member Months	2005	141,744												
	2006	143,378												

Table 2: Expense – Aggregate Population

All - Condition-Specific						All - Non Condition-Specific						All - Total					
Claims setting	Time	Costs (trended to 2006)	Total Cost PDMPM	$ Savings PDMPM from 2005	% Savings PDMPM from 2005	Claims setting	Time	Costs (trended to 2006)	Total Cost PDMPM	$ Savings PDMPM from 2005	% Savings PDMPM from 2005	Claims setting	Time	Costs (trended to 2006)	Total Cost PDMPM	$ Savings PDMPM from 2005	% Savings PDMPM from 2005
IP	2005	$4,412,025	$31.13			IP	2005	17,268,772.4	$121.83			IP	2005	$21,680,798	$152.96		
	2006	$3,534,531	$24.65	($6.47)	-20.8%		2006	21,208,788.9	$147.92	$26.09	21.4%		2006	$24,743,320	$172.57	$19.62	12.8%
ER	2005	$219,551	$1.55			ER	2005	2,035,490.7	$14.36			ER	2005	$2,255,042	$15.91		
	2006	$183,096	$1.28	($0.27)	-17.6%		2006	2,224,912.5	$15.52	$ 1.16	8.1%		2006	$2,408,009	$16.79	$0.89	5.6%
OP Fac	2005	$1,718,994	$12.13			OP Fac	2005	6,953,249.6	$49.05			OP Fac	2005	$8,672,244	$61.18		
	2006	$1,920,655	$13.40	$1.27	10.5%		2006	7,359,680.5	$51.33	$ 2.28	4.6%		2006	$9,280,336	$64.73	$3.54	5.8%
OP Prof	2005	$209,225	$1.48			OP Prof	2005	15,656,286.8	$110.45			OP Prof	2005	$15,865,512	$111.93		
Fac	2006	$140,410	$0.98	($0.50)	-33.7%	Fac	2006	19,401,939.6	$135.32	$ 24.87	22.5%	Fac	2006	$19,542,349	$136.30	$24.37	21.8%
Other	2005	$510,563	$3.60			Other	2005	11,590,959.8	$81.77			Other	2005	$12,101,523	$85.38		
	2006	$500,260	$3.49	($0.11)	-3.1%		2006	14,388,597.6	$100.35	$ 18.58	22.7%		2006	$14,888,857	$103.84	$18.47	21.6%
Pharm	2005	$2,576,832	$18.18			Pharm	2005	35,229,874.9	$248.55			Pharm	2005	$37,806,707	$266.73		
	2006	$2,300,269	$16.04	($2.14)	-11.7%		2006	43,514,321.6	$303.49	$ 54.95	22.1%		2006	$45,814,591	$319.54	$52.81	19.8%
Total	2005	$11,805,692	$83.29			Total	2005	48,769,425.9	$610.79			Total	2005	$60,575,118	$694.08		
	2006	$10,351,846	$72.20	($11.09)	-13.3%		2006	60,511,024.9	$741.58	$ 130.78	21.4%		2006	$70,862,871	$813.78	$119.69	17.2%
Member Months	2005	141,744				Member Months	2005	141,744				Member Months	2005	141,744			
	2006	143,378					2006	143,378					2006	143,378			

Table 3: Claims Detail – All Diagnoses-Top 25 ICD-9 Categories Ranked by PDMPM

ICD-9 Diagnoses Group Description	2005	2006	Change	% CHG
Other psychoses	$ 53.75	$ 53.27	$ (0.49)	-1%
Neurotic, personality, nonpsychotic disorders	$ 50.59	$ 54.23	$ 3.64	7%
Symptoms	$ 49.44	$ 46.44	$ (3.01)	-6%
COPD and allied conditions	$ 33.86	$ 24.00	$ (9.86)	-29%
Diseases of other endocrine glands	$ 30.66	$ 26.25	$ (4.42)	-14%
Ischemic heart disease	$ 19.36	$ 14.21	$ (5.14)	-27%
Other forms of heart disease	$ 13.43	$ 12.04	$ (1.39)	-10%
Cerebrovascular disease	$ 12.86	$ 12.31	$ (0.55)	-4%
Pneumonia and influenza	$ 11.02	$ 8.88	$ (2.14)	-19%
Arthropathies and related disorders	$ 10.48	$ 9.49	$ (0.99)	-9%
Other disorders of the central nervous system	$ 9.56	$ 12.10	$ 2.55	27%
Dorsopathies	$ 9.36	$ 8.96	$ (0.40)	-4%
Other diseases of respiratory system	$ 9.32	$ 9.23	$ (0.08)	-1%
Mental retardation	$ 8.68	$ 29.83	$ 21.15	244%
Acute respiratory infections	$ 7.72	$ 7.33	$ (0.39)	-5%
Other diseases of digestive system	$ 7.65	$ 8.30	$ 0.65	8%
Hypertensive disease	$ 6.76	$ 5.10	$ (1.65)	-24%
Other metabolic and immunity disorders	$ 6.63	$ 4.68	$ (1.95)	-29%
Diseases of esophagus, stomach, and duodenum	$ 6.62	$ 4.93	$ (1.69)	-26%
Other diseases of urinary system	$ 6.52	$ 5.89	$ (0.63)	-10%
Complications of surgical and medical care	$ 5.65	$ 7.06	$ 1.41	25%
Other diseases of intestines and peritoneum	$ 5.24	$ 3.72	$ (1.53)	-29%
Diseases of arteries, arterioles, and capillaries	$ 5.16	$ 2.70	$ (2.45)	-48%
Other diseases of the upper respiratory tract	$ 5.09	$ 6.31	$ 1.22	24%
Other bacterial diseases	$ 4.89	$ 5.91	$ 1.01	21%
Total - Top 25	**$ 390.31**	**$ 383.18**	**$ (7.13)**	**-2%**

[1]PDMPM = Per Diagnosed Member Months.

Table 4: Claims Detail – IP Facility Utilization–Top 25 ICD-9 Categories Ranked by Days per 1,000 DMM

ICD-9 Diagnoses Group Description	Days/1000 DMM[1]			Adm/1000 DMM[1]		
	2005	2006	% CHG	2005	2006	% CHG
Other psychoses	582.0	753.8	30%	36	32	-13%
Neurotic, personality, mental disorders	377.5	499.7	32%	7	12	64%
COPD and allied conditions	177.3	106.9	-40%	43	33	-24%
Pneumonia and influenza	101.2	83.3	-18%	22	18	-17%
Symptoms	76.1	89.1	17%	32	35	11%
Diseases of other endocrine glands	72.7	65.6	-10%	18	18	-3%
Ischemic heart disease	69.2	40.9	-41%	17	13	-20%
Other forms of heart disease	51.5	58.0	13%	11	10	-15%
Other diseases of respiratory system	50.9	44.2	-13%	6	6	-6%
Other diseases of intestines and peritoneum	35.4	21.1	-40%	6	5	-18%
Other diseases of digestive system	28.3	43.7	54%	8	9	20%
Other bacterial diseases	28.1	45.4	61%	4	5	30%
Cerebrovascular disease	27.4	44.0	61%	6	5	-8%
Other metabolic and immunity disorders	25.4	14.4	-43%	9	3	-63%
Infections of skin and subcutaneous tissue	25.2	25.9	3%	5	6	6%
Other diseases of urinary system	24.6	31.9	30%	6	8	24%
Complications mainly related to pregnancy	22.4	42.4	90%	9	12	38%
Diseases of esophagus, stomach, and duodenum	21.0	17.4	-17%	5	5	-1%
Acute respiratory infections	20.1	14.8	-26%	7	5	-23%
Osteopathies, chondropathies, and acquired musculoskeletal deformities	17.9	12.6	-30%	3	2	-36%
Normal delivery and care in pregnancy	17.4	25.9	49%	6	6	10%
Noninfectious enteritis and colitis	15.8	18.7	18%	4	5	16%
Diseases of arteries, arterioles, and capillaries	13.6	3.9	-71%	2	1	-43%
Diseases of veins and lymphatics, circulatory system	12.0	5.8	-52%	3	2	-29%
Arthropathies and related disorders	11.7	11.2	-4%	3	3	-2%
Total - Top 25	**1,905**	**2,121**	11%	**277**	**258**	-7%

[1]DMM = Member Months for those in the eval period.

Table 5: Claims Detail – IP Facility Expense - Top 25 ICD-9 Categories Ranked by PDMPM

ICD-9 Diagnoses Group Description	2005	2006	Change	% CHG
Other psychoses	$ 18.44	$ 17.49	$ (0.94)	-5%
COPD and allied conditions	$ 13.66	$ 9.13	$ (4.53)	-33%
Ischemic heart disease	$ 12.99	$ 9.14	$ (3.85)	-30%
Neurotic, personality, mental disorders	$ 9.36	$ 9.87	$ 0.52	6%
Symptoms	$ 8.83	$ 9.44	$ 0.61	7%
Pneumonia and influenza	$ 8.48	$ 6.87	$ (1.61)	-19%
Other forms of heart disease	$ 7.53	$ 6.88	$ (0.65)	-9%
Diseases of other endocrine glands	$ 7.28	$ 7.53	$ 0.24	3%
Other diseases of respiratory system	$ 6.45	$ 5.67	$ (0.78)	-12%
Other diseases of digestive system	$ 4.34	$ 5.03	$ 0.69	16%
Other bacterial diseases	$ 3.87	$ 4.58	$ 0.71	18%
Cerebrovascular disease	$ 3.31	$ 3.37	$ 0.07	2%
Other diseases of intestines and peritoneum	$ 3.29	$ 2.23	$ (1.06)	-32%
Diseases of arteries, arterioles, and capillaries	$ 3.29	$ 1.24	$ (2.05)	-62%
Other metabolic and immunity disorders	$ 3.29	$ 1.79	$ (1.49)	-45%
Arthropathies and related disorders	$ 3.09	$ 2.60	$ (0.48)	-16%
Infections of skin and subcutaneous tissue	$ 2.43	$ 2.41	$ (0.02)	-1%
Diseases of esophagus, stomach, and duodenum	$ 2.39	$ 1.91	$ (0.47)	-20%
Osteopathies, chondropathies, and acquired musculoskeletal deformities	$ 2.22	$ 1.37	$ (0.85)	-38%
Other diseases of urinary system	$ 2.19	$ 2.44	$ 0.25	11%
Complications mainly related to pregnancy	$ 2.03	$ 2.92	$ 0.90	44%
Acute respiratory infections	$ 1.40	$ 0.89	$ (0.51)	-36%
Normal delivery and care in pregnancy	$ 1.39	$ 1.55	$ 0.16	12%
Dorsopathies	$ 1.37	$ 1.56	$ 0.20	14%
Hernia of abdominal cavity	$ 1.35	$ 0.79	$ (0.56)	-41%
Total - Top 25	**$ 134.24**	**$ 118.71**	$ (15.53)	-12%

[1]PDMPM = Per Diagnosed Member Months.

Table 6: Claims Detail – Emergency Room Facility - Top 25 ICD-9 Categories Ranked by Visits per 1,000 DMM

ICD-9 Diagnoses Group Description	Visits/1000 DMM[1]			Expense PDMPM		
	2005	2006	% CHG	2005	2006	% CHG
Symptoms	556.1	572.6	3%	$ 4.99	$ 4.91	-2%
COPD and allied conditions	132.9	116.8	-12%	$ 1.63	$ 1.03	-37%
Neurotic, personality, nonpsychotic disorders	32.4	31.4	-3%	$ 1.13	$ 0.89	-21%
Diseases of other endocrine glands	39.1	38.0	-3%	$ 1.08	$ 0.53	-51%
Other psychoses	11.0	12.7	15%	$ 0.94	$ 1.13	21%
Ischemic heart disease	11.1	8.3	-26%	$ 0.71	$ 0.59	-17%
Pneumonia and influenza	34.2	34.9	2%	$ 0.68	$ 0.47	-31%
Contusion with intact skin surface	65.6	79.7	21%	$ 0.60	$ 0.55	-8%
Fracture of neck and trunk	4.4	4.6	5%	$ 0.57	$ 0.05	-91%
Acute respiratory infections	115.1	133.0	16%	$ 0.55	$ 0.55	-1%
Sprains and strains of joints and adjacent muscles	70.0	82.9	18%	$ 0.54	$ 0.57	5%
Other diseases of urinary system	36.9	38.0	3%	$ 0.53	$ 0.38	-28%
Other diseases of digestive system	10.8	11.8	9%	$ 0.50	$ 0.31	-38%
Poisoning by drugs, medicinal and biological substances	11.0	11.1	1%	$ 0.50	$ 0.10	-79%
Cerebrovascular disease	8.0	7.0	-12%	$ 0.46	$ 0.18	-61%
Fracture of upper limb	14.5	17.9	24%	$ 0.32	$ 0.20	-40%
Diseases of esophagus, stomach, and duodenum	13.5	10.6	-21%	$ 0.31	$ 0.10	-68%
Other diseases of respiratory system	33.3	27.1	-19%	$ 0.28	$ 0.39	36%
Dorsopathies	56.1	65.1	16%	$ 0.27	$ 0.32	17%
Other forms of heart disease	19.1	17.6	-8%	$ 0.26	$ 0.24	-9%
Certain traumatic complications and unspecified injuries	86.9	103.8	19%	$ 0.26	$ 0.25	-3%
Other disorders of the central nervous system	31.4	26.7	-15%	$ 0.25	$ 0.22	-12%
Infections of skin and subcutaneous tissue	19.1	27.1	42%	$ 0.23	$ 0.30	26%
Other metabolic and immunity disorders	16.3	7.8	-52%	$ 0.23	$ 0.08	-64%
Other bacterial diseases	8.7	13.4	53%	$ 0.22	$ 0.18	-17%
Total - Top 25	**1,438**	**1,500**	**4%**	**$ 18.05**	**$ 14.49**	**-20%**

[1]DMM = Member Months for those in the eval period.

Table 7: Claims Detail – Pharmacy Utilization and Expense - Top 25 NDC Categories by Scripts per 100 DMM

NDC DRUG CLASS DESCRIPTION	Scripts/100 DMM[1]			Expense PDMPM[2]			
	2005	2006	% CHG	2005	2006	Change	% CHG
Gastric Acid Secretion Reducers	372	321	-14%	$ 35.12	$ 29.37	$ (5.75)	-16%
Antipsychotics,Atypical	156	124	-20%	$ 34.77	$ 27.91	$ (6.86)	-20%
Anticonvulsants	299	260	-13%	$ 29.62	$ 26.16	$ (3.46)	-12%
Lipotropics	294	262	-11%	$ 28.27	$ 25.33	$ (2.94)	-10%
Analgesics, Narcotics	493	405	-18%	$ 18.44	$ 13.66	$ (4.79)	-26%
Leukotriene Receptor Antagonists	192	199	4%	$ 15.74	$ 16.49	$ 0.76	5%
SSRIs	215	175	-19%	$ 14.29	$ 10.36	$ (3.93)	-27%
Beta-Adrenergic Agents	329	293	-11%	$ 12.74	$ 11.86	$ (0.88)	-7%
Insulins	143	121	-16%	$ 12.22	$ 11.40	$ (0.82)	-7%
Beta-Adrenergic & Glucocorticoid Combo	80	68	-15%	$ 11.03	$ 9.68	$ (1.34)	-12%
Antihyperglycemic, Insulin Response Enhancer	84	67	-20%	$ 10.46	$ 8.61	$ (1.85)	-18%
Glucocorticoids	156	144	-8%	$ 10.07	$ 10.40	$ 0.33	3%
Antipsychotics, Atyp, D2 Partial Agonist/5Ht Mixed	20	23	10%	$ 6.80	$ 7.72	$ 0.92	14%
Platelet Aggregation Inhibitors	55	45	-18%	$ 6.00	$ 4.76	$ (1.24)	-21%
Nsaids, Cyclooxygenase Inhibitor - Type	151	118	-22%	$ 5.55	$ 2.98	$ (2.57)	-46%
Calcium Channel Blocking Agents	116	90	-23%	$ 5.10	$ 3.93	$ (1.18)	-23%
Nasal Anti-Inflammatory Steroids	80	73	-9%	$ 5.07	$ 4.82	$ (0.25)	-5%
Serotonin-Norepinephrine Reuptake-Inhib (Snris)	42	44	4%	$ 4.79	$ 4.86	$ 0.07	1%
Skeletal Muscle Relaxants	131	107	-18%	$ 4.63	$ 3.19	$ (1.44)	-31%
Antihistamines - 2Nd Generation	176	157	-11%	$ 4.54	$ 3.78	$ (0.76)	-17%
Macrolides	92	79	-13%	$ 4.09	$ 3.36	$ (0.73)	-18%
Antiemetic/Antivertigo Agents	83	72	-14%	$ 3.85	$ 3.81	$ (0.04)	-1%
Tx For Attention Deficit-Hyperact(Adhd)/Narcolepsy	42	47	10%	$ 3.42	$ 4.13	$ 0.71	21%
Norepinephrine And Dopamine Reuptake Inhib (Ndris)	38	34	-10%	$ 3.33	$ 3.29	$ (0.04)	-1%
Anti-Anxiety Drugs	204	164	-20%	$ 3.27	$ 2.38	$ (0.89)	-27%
Top 25	**4,044**	**3,491**	**-14%**	**$ 293.19**	**$ 254.24**	**$ (38.95)**	**-13%**

[1]DMM = Member Months for those in the evaluation period.
[2]PDMPM = Per Diagnosed Member Months.